ORDER NO. RD83072113A2

Service Manual

Radio Cassette

RX-C45LS

Portable Component System with 4-Band Radio

•Please use this manual together with the service manual for mc ... order No. RD83052107C2.
•This Service Manual indicates the main differences between; Or

02140244 91004988 34
SM-RXC45LS
SRRVICE MANUAL NSG

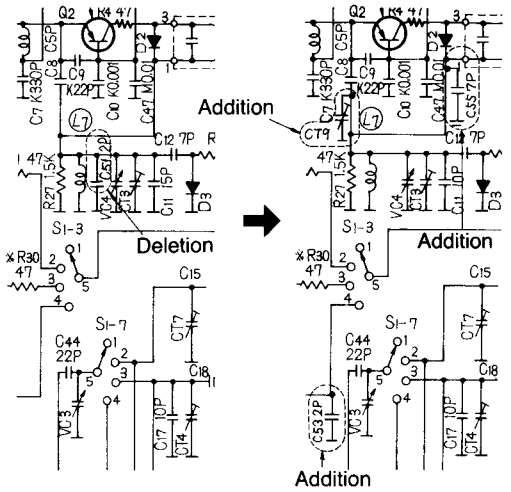
■ PARTS COMPARISON TABLE

Ref. No.	Description	Part Number		Pcs/ Set	Remarks
		RX-C45LS (RD83052107C2)	RX-C45LS F.R. Germany		
L7	Oscillator Coil, FM	RLD4Y43	RLO4N168	1	
L309, 310	Choke Coil	——	RLQZZ4701	2	Added
CT9	Trimmer Capacitor	——	RCVCTZ3210	1	Added
K1	Front Cabinet Ass'y (Silver)	RYM1XC45LSX7	——		Deleted
K1	Front Cabinet Ass'y	RYM1XC45LSX1	RYM1XC45LSZ1	1	
K2	Rear Cabinet Ass'y (Silver)	RYFXC45LSXG7	——		Deleted
K2	Rear Cabinet Ass'y	RYFXC45LSXG1	RYFXC45LSXZ1	1	
K2-2	Handle (Silver)	RKX277Z5	——		Deleted
K3	Cassette Panel Ass'y (Silver)	RYPXC45LSXG5	——		Deleted
K4	Cassette Holder (Silver)	RYQXC45LSXG1	——		Deleted
K5	Battery Compartment (Silver)	RKK244Z94	——		Deleted
K14	Front Speaker Cabinet Ass'y (Silver)	RYM2XC45LS94	——		Deleted
K15	Cover, Speaker Cabinet (Left) (Silver)	RKF641Z94	——		Deleted
K16	Cover, Speaker Cabinet (Right) (Silver)	RKF641Y94	——		Deleted
R27	Carbon, ¼ W 1.2 kΩ	ERD25FJ152	ERD25FJ122	1	S
C5	Ceramic, 50 V, 18 pF	ECCD1H150KC	ECCD1H180KC	1	
C9	Ceramic, 50 V, 33 pF	ECCD1H220KC	ECCD1H330KC	1	
C11	Ceramic, 50 V, 10 pF	ECCD1H150KC	ECCD1H100KC	1	
C51	Ceramic, 50 V, 2 pF	ECCD1H020C	——		Deleted
C52	Ceramic, 50 V, 100 pF	ECCD1H101K	——		Deleted
C53	Ceramic, 50 V, 2 pF	——	ECCD1H020C	1	Added
C55	Ceramic, 50 V, 7 pF	——	ECCD1H070DC	1	Added
C346	Ceramic, 50 V, 0.001 μF	——	ECKD1H102ZF	1	Added

Panasonic

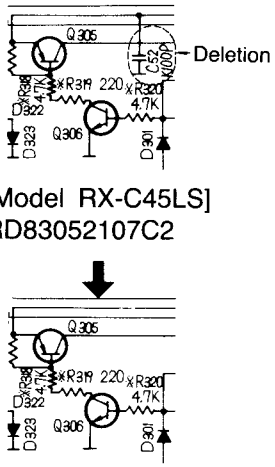
Matsushita Electric Trading Co., Ltd.
P.O. Box 288, Central Osaka Japan

■ SCHEMATIC DIAGRAM



[Model RX-C45LS]
RD83052107C2

[Model RX-C45LS]
F.R. Germany



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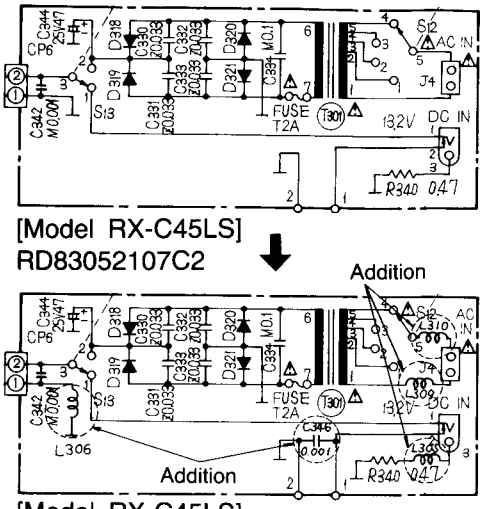
RD83052107C2

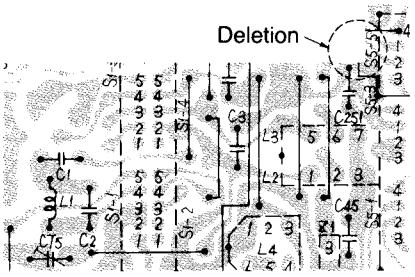
[Model RX-C45LS]
F.R. Germany



[Model RX-C45LS]
RD83052107C2

[Model RX-C45LS]
F.R. Germany

■ CIRCUIT BOARD AND WIRING CONNECTION DIAGRAM



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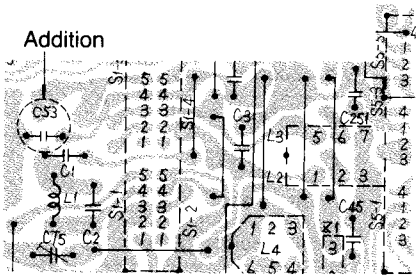
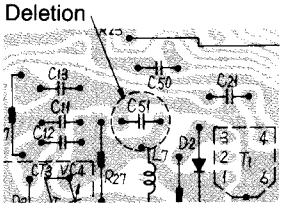
RD83052107C2



[Model RX-C45LS]
F.R. Germany



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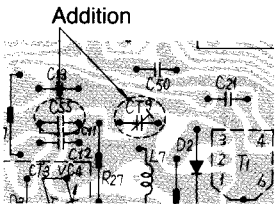

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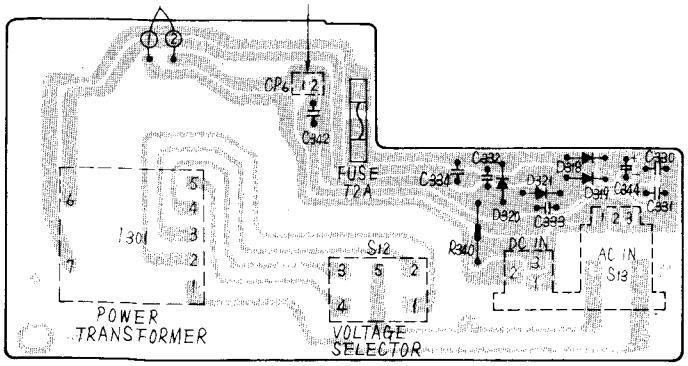

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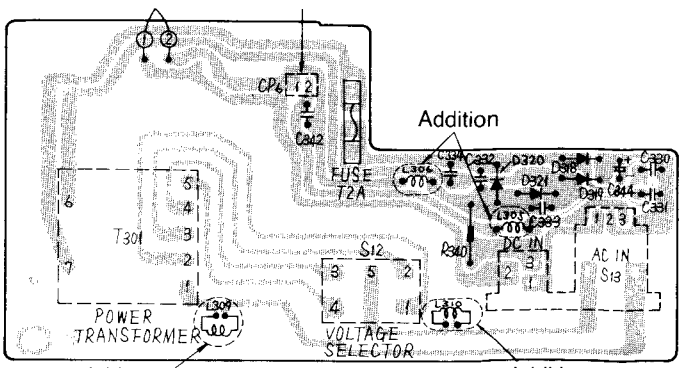

[Model RX-C45LS]
F.R. Germany

■ MEASUREMENTS AND ADJUSTMENT

	BAND	SIGNAL GENERATOR or SWEEP GENERATOR		RADIO DIAL SETTING	INDICATOR (ELECTRONICS VOLTMETER or SCOPE)	ADJUSTMENT	REMARKS
		CONNECTIONS	FREQUENCY				
		FM-RF ALIGNMENT					
(3)	FM	Connect to test point ① through FM dummy antenna. Negative side to test point ⑩.	87.5 MHz	Variable capacitor fully closed.	Output meter across voice coil.	L7 (FM OSC Coil)	(*2) Adjust for maximum output.
(4)	FM		108 MHz	Variable capacitor fully open.	〃	CT3 (FM OSC Trimmer)	〃
(5)	FM		90 MHz	Tune to signal.	〃	L5 (FM ANT Coil)	〃
(6)	FM		106 MHz	〃	〃	CT2 (FM ANT Trimmer)	(*2) Adjust for maximum output. Repeat steps (3)~(6).
	(*2) Three output responses will be present; proper tuning is the center frequency.						

[Model RX-C45LS]
RD83052107C2

	BAND	SIGNAL GENERATOR or SWEEP GENERATOR		RADIO DIAL SETTING	INDICATOR (ELECTRONICS VOLTMETER or SCOPE)	ADJUSTMENT	REMARKS
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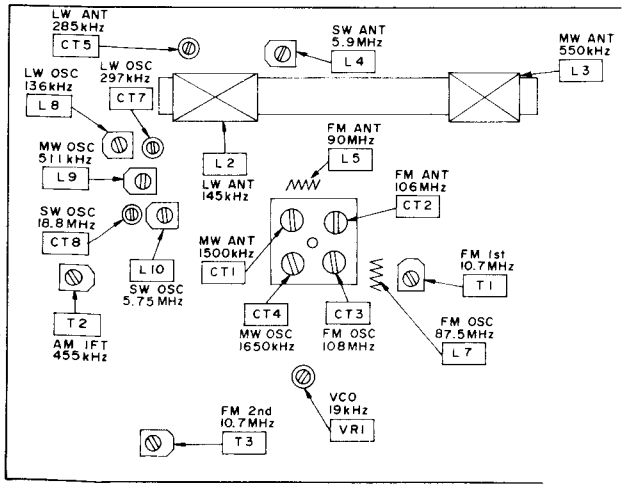
(5)	FM		90 MHz	Tune to signal.	〃	L5 (FM ANT Coil)	〃
(6)	FM		106 MHz	〃	〃	CT2 (FM ANT Trimmer)	〃
(7)	FM		108 MHz	Variable capacitor fully open.	〃	CT9 (FM OSC Trimmer)	(*2) Adjust for maximum output. Repeat steps (3)~(7).
	(*2) Three output responses will be present; proper tuning is the center frequency.						

[Model RX-C45LS]
F.R. Germany

■ ALIGNMENT POINTS *Please refer to Circuit Boad and Wiring Connection Diagram which is located test poits.



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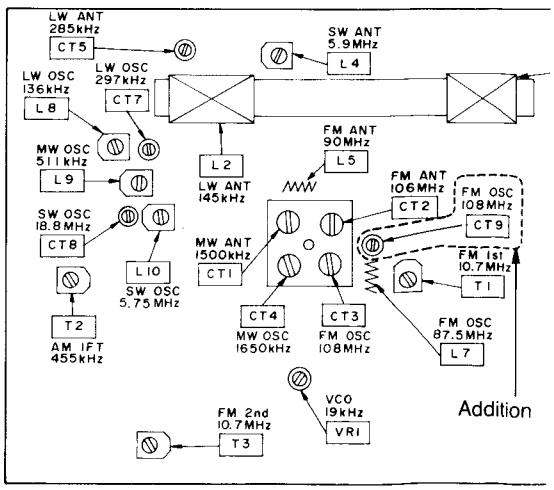

[Model RX-C45LS]
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RX-C45LS DEUTSCH

	UKW-HF-ABGLEICH						
(3)	UKW	Über eine künstliche UKW-Antenne an den Meßpunkt ▼ anschließen. Den negativen Ausgang an den Meßpunkt ▽ anschließen.	87,5 MHz	Drehkondensator ganz geschlossen.	Ausgangsleistungsmesser parallel zur Lautsprecher-Schwingspule.	L7 (UKW-Oszillatorspule)	(*2) Die maximale Ausgangsleistung einstellen.
(4)	UKW		108 MHz	Drehkondensator ganz aufgedreht.	"	CT3 (UKW-Oszillatortrimmer)	"
(5)	UKW		90 MHz	Das Signal abstimmen.	"	L5 (UKW-Antennenspule)	"
(6)	UKW		106 MHz	"	"	CT2 (UKW-Antennentrimmer)	(*2) Die maximale Ausgangsleistung einstellen. Die Schritte (3) bis (6) wiederholen.
	(*2) Es gibt drei verschiedene Ausgangsfrequenzkurven. Stimmen Sie die Mittelfrequenz ab.						

[Model RX-C45LS]
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	UKW-HF-ABGLEICH						
(3)	UKW	Über eine künstliche UKW-Antenne an den Meßpunkt ▼ anschließen. Den negativen Ausgang an den Meßpunkt ▽ anschließen.	87,5 MHz	Drehkondensator ganz geschlossen.	Ausgangsleistungsmesser parallel zur Lautsprecher-Schwingspule.	L7 (UKW-Oszillatorspule)	(*2) Die maximale Ausgangsleistung einstellen.
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(5)	UKW		90 MHz	Das Signal abstimmen.	"	L5 (UKW-Antennenspule)	"
(6)	UKW		106 MHz	"	"	CT2 (UKW-Antennentrimmer)	"
(7)	UKW		108 MHz	Drehkondensator ganz aufgedreht.	"	CT9 (UKW-Oszillatortrimmer)	(*2) Die maximale Ausgangsleistung einstellen. Die Schritte (3) bis (7) wiederholen.
	(*2) Es gibt drei verschiedene Ausgangsfrequenzkurven. Stimmen Sie die Mittelfrequenz ab.						

[Model RX-C45LS]
F.R. Germany

RD Ⓕ XGZ
Printed in Japan

ORDER NO. RD83052107C2

Service Manual

Radio Cassette

RX-C45LS

Portable Component System with 4-Band Radio

■ SPECIFICATIONS

General:

Power Requirement:	AC; 110~115/115~127/200~220/ 230~250 V, 50/60 Hz Battery; 12 V (eight "D" Size Flashlight Batteries) (National UM-1 or equivalent) Car battery; with optional car adaptor RP-952
Power Consumption:	36 W (AC only)
Power Output:	15 W (7.5 W×2) . . . RMS (max.) 20 W (10 W×2) . . . MPO
Speaker:	Woofer; 10 cm (4") PM Dynamic Speaker (3Ω) Tweeter; 3 cm (1 1/4") Ceramic Speaker (1.3 kΩ)
Input:	MIC; sensitivity 0.26 mV/applicable microphone impedance 200~600Ω Phono: sensitivity 2.5 mV/47 kΩ over DC IN; 13.2 V
Output:	EXT SP; 3Ω~8Ω Headphones; 8Ω
REC/PB Connection:	5P DIN type IN; 0.3 mV/3.3 kΩ over OUT; 360 mV/4.7 kΩ under
Dimensions:	Total Size 537 (W)×176 (H)×183 (D) mm (21 5/32×6 15/16×6 7/32)" Main Unit 304 (W)×176 (H)×183 (D) mm (11 31/32×6 15/16×7 7/32)" Speaker Box 118 (W)×176 (H)×148 (D) mm (4 21/32×6 15/16×5 13/16)"
Weight:	5.4 kg (11 lb. 14 oz.) without batteries

Radio Section:

Radio Frequency Range:	FM; 87.5~108 MHz LW; 150~285 kHz (2000~1060 m) MW; 520~1610 kHz (577~186 m) SW; 5.9~18 MHz (50.8~16.7 m)
Intermediate Frequency:	FM; 10.7 MHz AM (LW/MW/SW); 455 kHz
Sensitivity:	FM; 1.5μV (−3 dB Limit sens) LW; 100μV/m/50 mW output MW; 50μV/m/50 mW output SW; 4μV/50 mW output

Tape Deck Section:

Frequency Response:	60~12,000 Hz (with normal tape) 60~15,000 Hz (with Metal tape)
Recording system:	AC bias, AC erase
Tape Speed:	4.8 cm/s, (1 7/8 ips)
Wow and Flutter:	0.08% (WRMS)
Program Time:	1 hour with C-60 cassette tape
Track System:	4-track 2 channel stereo recording and playback

Specifications are subject to change without notice.

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P.O. Box 288, Central Osaka Japan

LOCATION OF CONTROLS AND COMPONENTS

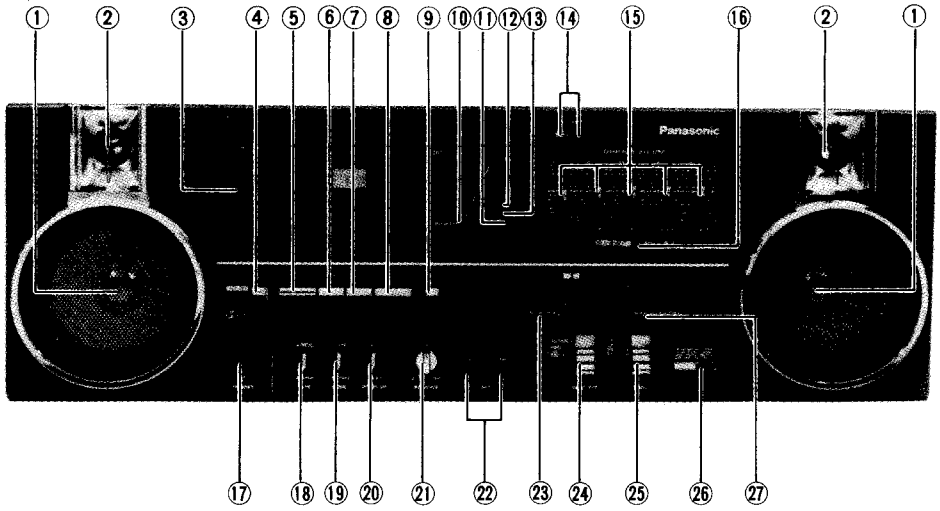


Fig. 1

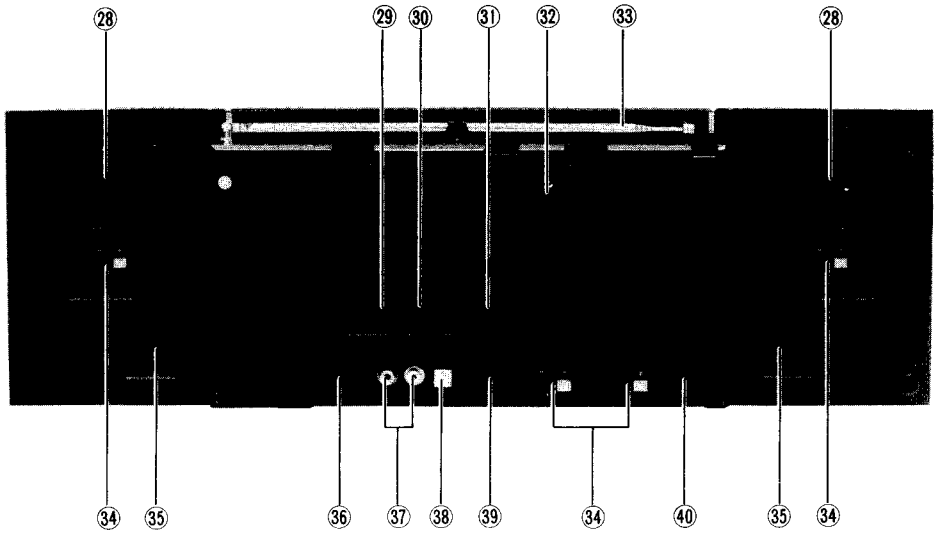


Fig. 2

① Speakers (Woofer) [10 cm (4"), 3Ω]
② Speakers (Tweeter) [3 cm (1 1/4"), 1.3 kΩ]
③ Cassette Compartment
④ Record Button
⑤ Playback Button
⑥ Rewind/Review Button
⑦ Fast Forward/Cue Button
⑧ Stop/Eject Button
⑨ Pause Button
⑩ Level Meter (LEVEL)
⑪ Dolby Noise Reduction Indicator (DOLBY NR)
⑫ Operation/Battery Indicator (OPR/BATT)
⑬ FM Stereo Indicator (FM STEREO)
⑭ Tape Counter and Reset Button (COUNTER)
⑮ Graphic Equalizer Control (GRAPHIC EQUALIZER)
⑯ Volume Control (VOLUME)
⑰ Headphone Jack (PHONES) [8Ω, Ø6]
⑱ Tape Switch (TAPE) [METAL, NORMAL]
⑲ Mode Switch (MODE) [MONO, STEREO]
⑳ Dolby Noise Reduction Switch (DOLBY NR)
㉑ Balance Control (BALANCE)
㉒ Microphone Jacks (MIC) [0.26 mV, 200~600Ω, Ø3.5]
㉓ Fine Tuning Knob (FINE TUNING)
㉔ Function Switch (SELECTOR) [DIN/PHONE, RADIO, OFF/TAPE]
㉕ Band Switch (BAND) [FM, LW, MW, SW]
㉖ Built-in Microphone (MIC)
㉗ Tuning Control (TUNING)
㉘ Speaker Wall Mounts
㉙ AC Socket (AC IN ~)
㉚ DC Input Jack (DC IN 13.2 V ⊖-◉-⊕)
㉛ Voltage Selector (VOLTAGE SELECTOR)
㉜ Battery Compartment
㉝ Telescopic Antenna
㉞ Speaker Terminals
㉟ Speaker Switch (LOCK/RELEASE)
㊱ Input Switch (PHONO, DIN)
㊲ Phono Input Jacks (PHONO) [2.5 mV/47 kΩ over]
㊳ Phono Earth Terminal
㊴ DIN Connector Jack (DIN REC/PLAY)
[IN . . . 0.3 mV/3.3 kΩ, OUT . . . 360 mV/4.7 kΩ under]
㊵ Beat Proof Switch (BEAT PROOF), [I, II, III]

DOLBY SYSTEM

*"Dolby" and the double-D symbol are trademarks of Dolby Laboratories Licensing Corporation.
*Noise reduction system manufactured under license from Dolby Laboratories Licensing Corporation.

DISASSEMBLY INSTRUCTIONS

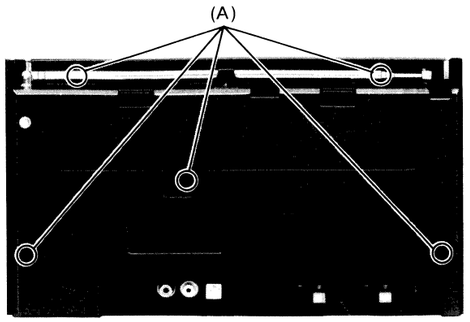


Fig. 3

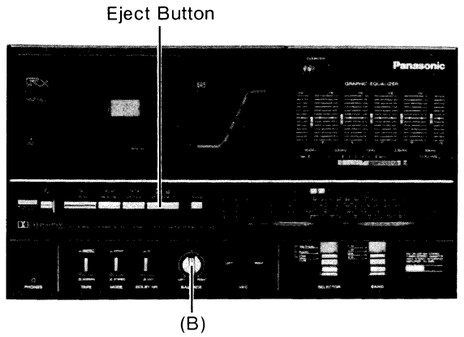


Fig. 4

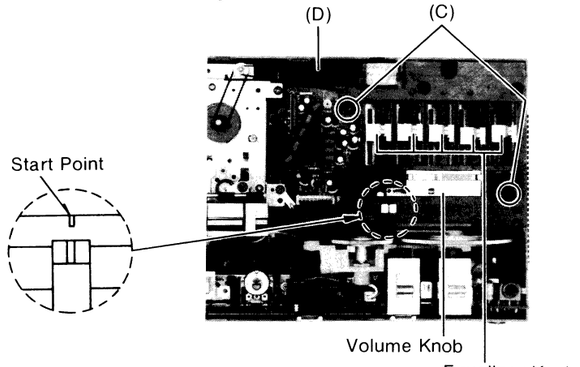


Fig. 5

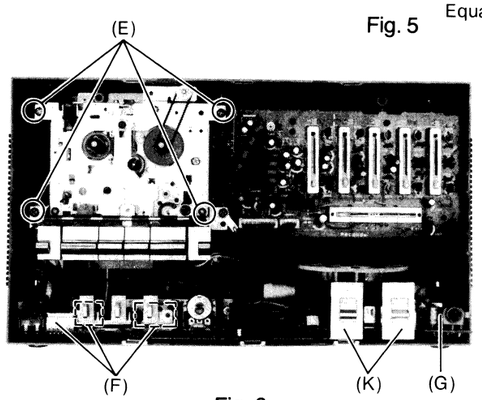


Fig. 6

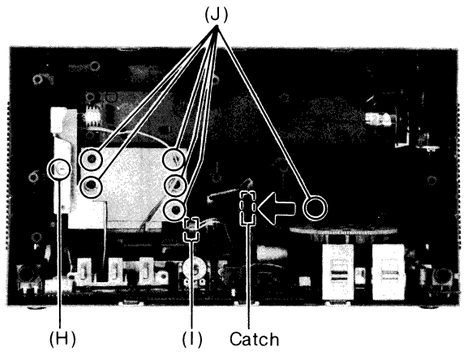


Fig. 7

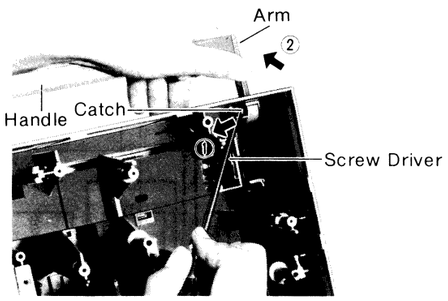


Fig. 8

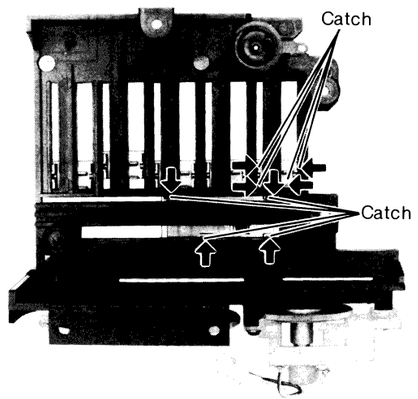


Fig. 9

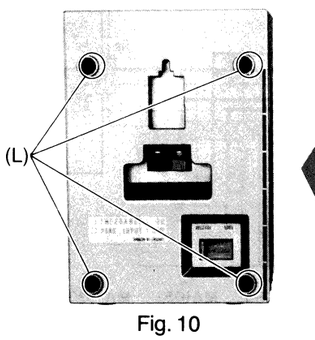


Fig. 10

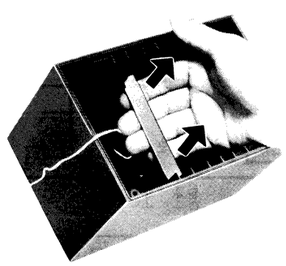


Fig. 11

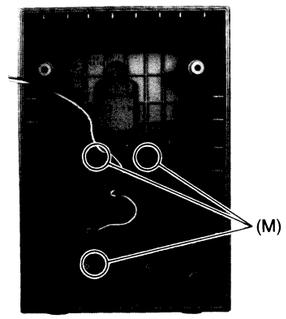
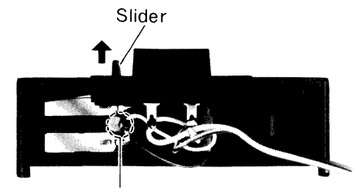


Fig. 12



When removing the slider, the spring and steel ball will go out.

Fig. 13

■ TO REMOVE CASSETTE PANEL

●Remove the cassette panel in the direction of arrow.

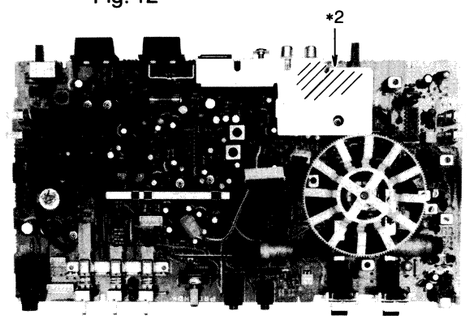


Fig. 14

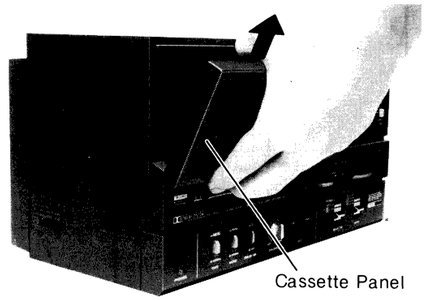
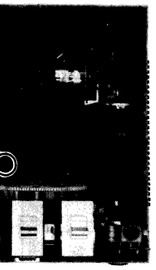


Fig. 15

Ref No.	Procedure	Shown in Fig.—.	To remove—.	Remove—.
1	1~3	3	Front Cabinet	Screw (3×45) ..... (A)×5
2		4		Knob ..... (B)×1
3		4		Push the eject button
4	1~6	5	Dial Chassis *1	Screw (3×12) ..... (C)×2
5		5		Remove the counter belt ..... (D)×1
6		——		Pull out the dial chassis
7	1~3, 7, 8	6	Mechanism	Screw (3×12) ..... (E)×4
8		6		Socket ..... (F)×3
9	1~6, 8~12	6	Circuit Board *2	Socket ..... (G)×1
10		7		Screw (3×12) ..... (H)×1
11		7		Socket ..... (I)×1
12		——		Pull out the circuit board
13	1~14	7	Power Source Circuit Board	Screw (3×12) ..... (J)×6
14		7		Push the catch in the direction of arrow and remove the circuit board
15	1~8, 15	8	Handle	Push the catch in the direction of arrow ① and remove the handle in the direction of arrow ②
16	1~6, 16	9	Equalizer and Volume knob	Push the catch and remove the knob.
17	1~3, 17	6	Function and Band Knob	Knob ..... (K)×2
18	18	10	Speaker Cabinet	Screw (3×20) ..... (L)×4
19	18~20	11	Slider Chassis	Remove the bracket in the direction of arrow.
20		12		Screw (3×12) ..... (M)×3
21	18~21	13	Slider	Remove the slider in the direction of arrow.

*1. To reassemble the dial chassis, note the following.
1) Set the equalizer and volume knob at the position as shown in fig. 5.
2) Set the tuning capacitor to maximum cpacity. (Turn to fully counter-clockwise.)
3) Set the dial pointer to start point as shown in fig. 5.
4) Hang the counter belt.

*2. Press this Part of the Shield Plate to put the Printed Circuit into the Rear Cabinet as shown in Fig. 14.

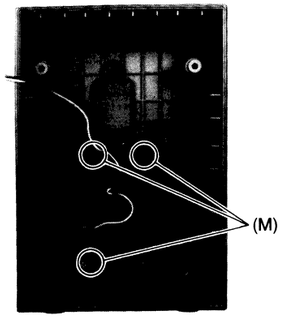


Screw Driver

Catch

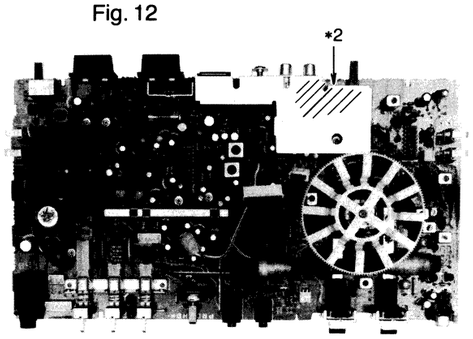
Catch

. 11



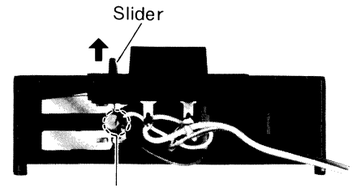
(M)

Fig. 12



*2

Fig. 14



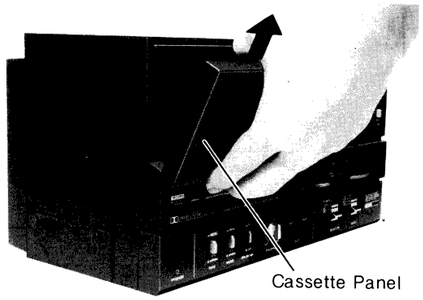
Slider

When removing the slider, the spring and steel ball will go out.

Fig. 13

■ TO REMOVE CASSETTE PANEL

●Remove the cassette panel in the direction of arrow.



Cassette Panel

Fig. 15

Ref No.	Procedure	Shown in Fig.—.	To remove—.	Remove—.
1	1~3	3	Front Cabinet	Screw (3×45) ..... (A)×5
2		4		Knob ..... (B)×1
3		4		Push the eject button
4	1~6	5	Dial Chassis *1	Screw (3×12) ..... (C)×2
5		5		Remove the counter belt ..... (D)×1
6		——		Pull out the dial chassis
7	1~3, 7, 8	6	Mechanism	Screw (3×12) ..... (E)×4
8		6		Socket ..... (F)×3
9	1~6, 8~12	6	Circuit Board *2	Socket ..... (G)×1
10		7		Screw (3×12) ..... (H)×1
11		7		Socket ..... (I)×1
12		——		Pull out the circuit board
13	1~14	7	Power Source Circuit Board	Screw (3×12) ..... (J)×6
14		7		Push the catch in the direction of arrow and remove the circuit board
15	1~8, 15	8	Handle	Push the catch in the direction of arrow ① and remove the handle in the direction of arrow ②
16	1~6, 16	9	Equalizer and Volume knob	Push the catch and remove the knob.
17	1~3, 17	6	Function and Band Knob	Knob ..... (K)×2
18	18	10	Speaker Cabinet	Screw (3×20) ..... (L)×4
19	18~20	11	Slider Chassis	Remove the bracket in the direction of arrow.
20		12		Screw (3×12) ..... (M)×3
21	18~21	13	Slider	Remove the slider in the direction of arrow.

*1. To reassemble the dial chassis, note the following.
1) Set the equalizer and volume knob at the position as shown in fig. 5.
2) Set the tuning capacitor to maximum cpacity. (Turn to fully counter-clockwise.)
3) Set the dial pointer to start point as shown in fig. 5.
4) Hang the counter belt.

*2. Press this Part of the Shield Plate to put the Printed Circuit into the Rear Cabinet as shown in Fig. 14.

BLOCK DIAGRAM

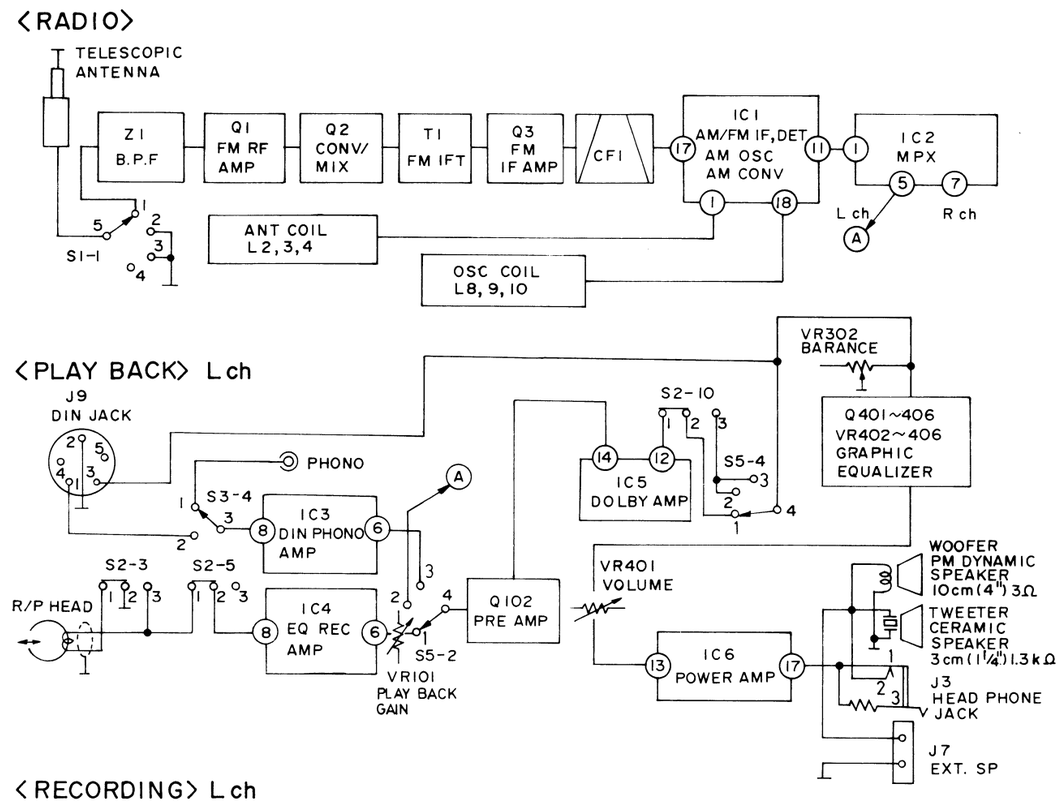


Fig. 16

Notes:

1. S1-1~S1-8: Band switch in "FM" position. (1 . . . FM, 2 . . . LW, 3 . . . MW, 4 . . . SW)
2. S2-1~S2-10: Record/playback switch in "playback" position. (1 . . . Playback, 3 . . . Record)
3. S3-1~S3-4: Input switch in "Phono" position. (1 . . . Phono, 2 . . . DIN)
4. S4-1~S4-6: Tape switch in "NORMAL" position. (1 . . . NORMAL, 2 . . . METAL)
5. S5-1~S5-6: Function switch in "OFF/TAPE" position. (1 . . . OFF/TAPE, 2 . . . RADIO, 3 . . . DIN/PHONO)
6. S6: Beat proof switch in "I" position. (1 . . . I, 2 . . . II, 3 . . . III)
7. S7: Dolby Noise Reduction switch in "IN" position.
8. S8-1, S8-2: Mode switch in "STEREO" position. (1 . . . MONO, 2 . . . STEREO)
9. S9: Motor ON/OFF switch in "OFF" position.
10. S10: Play ON/OFF switch in "OFF" position.
11. S11: FF, rewind ON/OFF switch in "OFF" position.
12. S12: Voltage select switch.
13. S13: AC/DC IN select switch in "DC IN" position.
14. VR1: VCO oscillator frequency adjust VR.
15. VR101, 201: Playback gain adjustment VR.
16. VR102, 202, 304: Bias current adjustment VR.
17. VR103, 203: Overall gain adjustment VR.
18. VR301: Erase current adjustment VR.
19. VR302: Balance control.
20. V303: LED meter adjustment VR.
21. VR401, 501: Volume control.
22. VR402~406, 502~506: Graphic equalizer VR.
23. The mark (▼) shows test point e.g. ▼ = test point 1.
24. The mark (※) shows printed-type resistors.
25. DC voltage measurement are taken with electronics voltmeter from negative terminal of battery.
    < > . . . FM position, ( ) . . . AM position,
    [ ] . . . Recording position, No mark . . . Playback position.
26. Battery current: No signal ..... 151 mA
    Maximum output (radio) 1.26A
    Maximum output (tape) (Playback) 1.32A
27. Important safety notice
    Components identified by ⚠ mark have special characteristics important for safety.
    When replacing any of these components, use only manufacturer's specified parts.

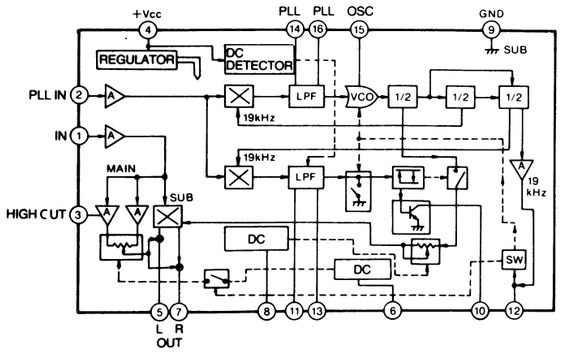
OVERALL FREQUENCY RESPONSE

Metal	100 Hz 2±5 dB	
	1 kHz ———	+ Ⓑ Voltage Line
	10 kHz 3±5 dB	Record Signal Line
	100 Hz 1±5 dB	Radio (FM) Signal Line
Normal	1 kHz ———	Playback Signal Line
	10 kHz 2±5 dB	▶▶ Level Meter Signal Line

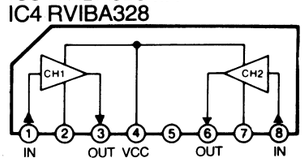
Graphic Equalizer Characteristics (Line position)
Input=Line in (−30 dB), Output=SP out, Main VR=max

max (center= 0 dB)	100 Hz 330 Hz 1 kHz 3.3 kHz 10 kHz	12±3 dB 10±3 dB	min (center= 0 dB)	100 Hz 330 Hz 1 kHz 3.3 kHz 10 kHz	12±3 dB

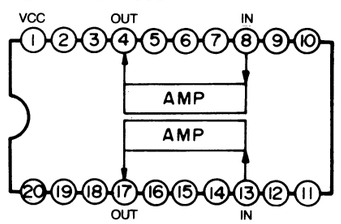
IC2 RVIBA1356



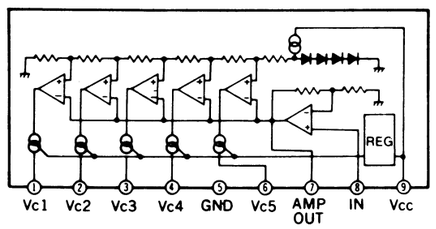
IC3 RVIBA328MR
IC4 RVIBA328



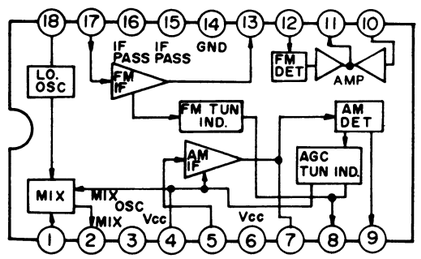
IC6 RVILA4505



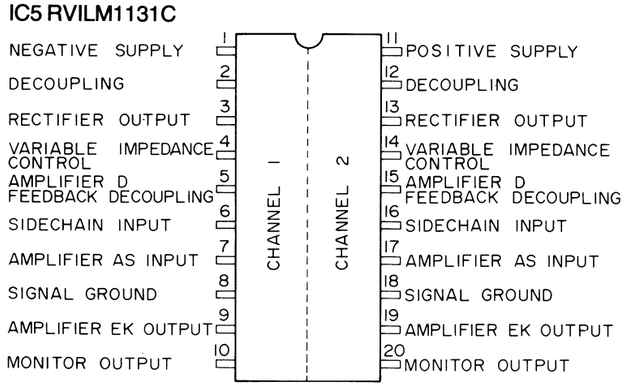
IC7 AN6884



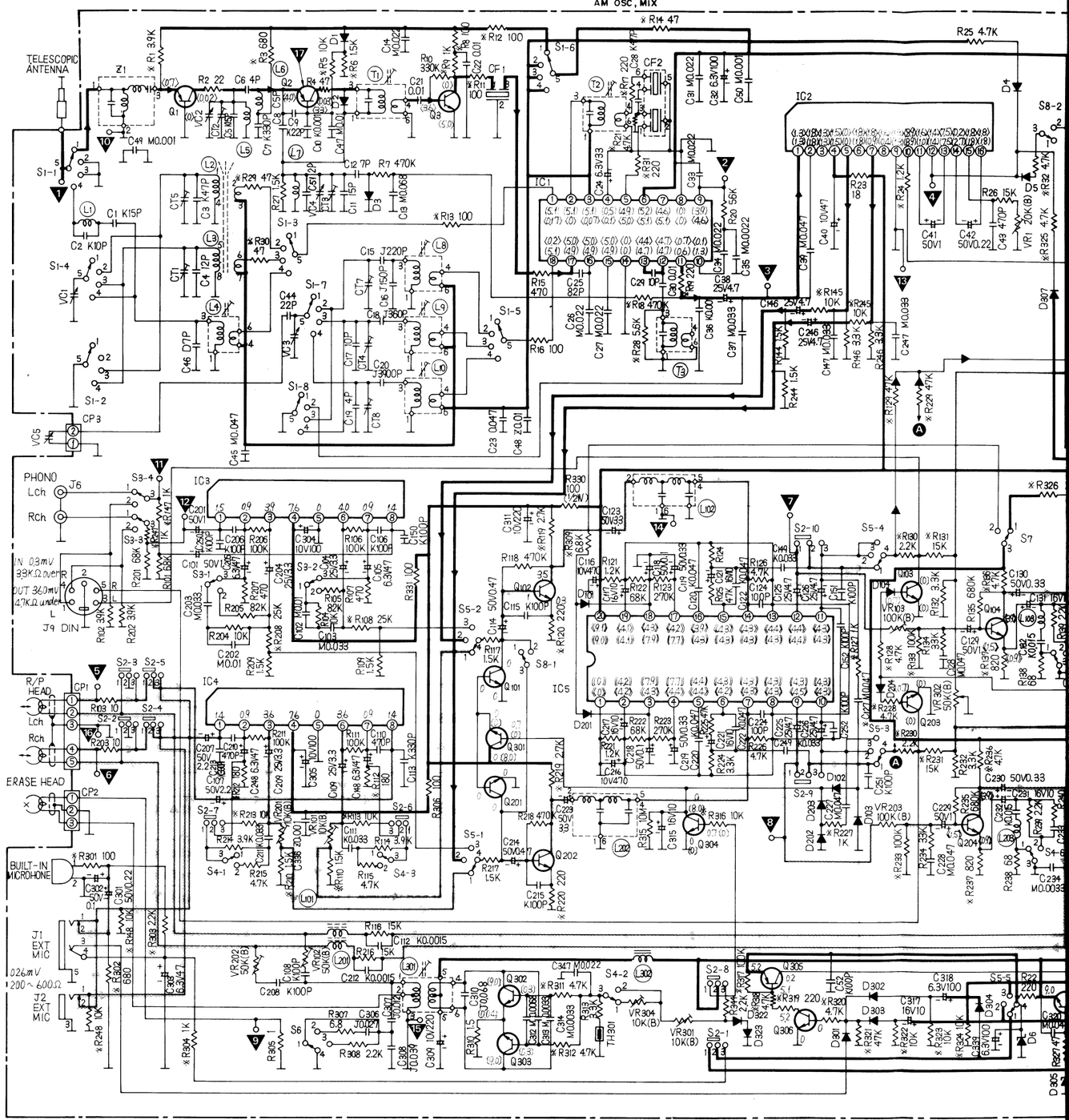
IC1 AN7226



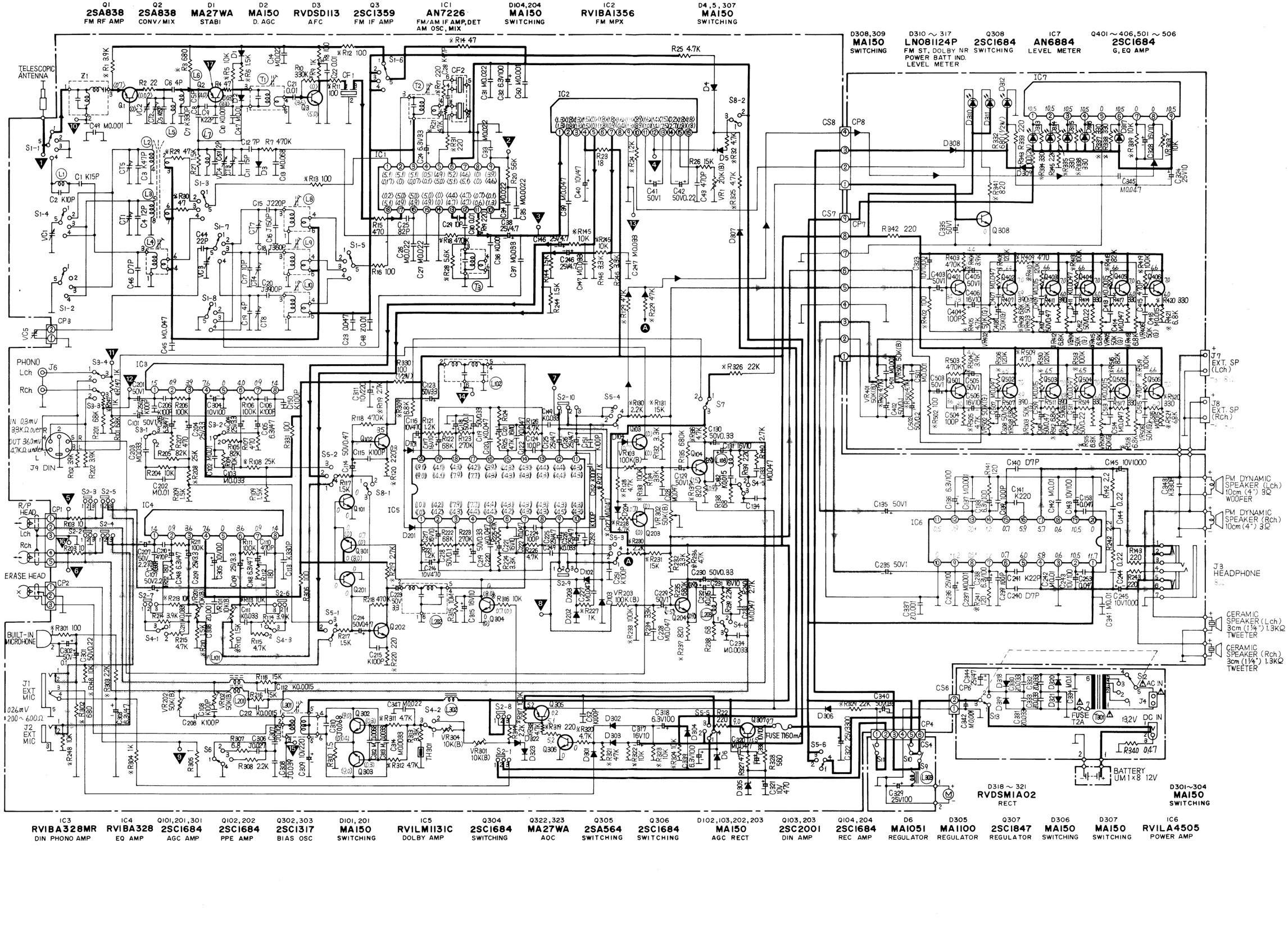
IC5 RVILM1131C



SCHEMATIC DIAGRAM MODEL



SCHEMATIC DIAGRAM MODEL RX-C45LS



MEASUREMENTS AND ADJUSTMENTS

■ ALIGNMENT INSTRUCTION

READ CAREFULLY BEFORE ATTEMPTING ALIGNMENT

1. Set volume control to maximum.
2. Set graphic equalizer to center.
3. Set band switch to LW, MW, SW or FM.
4. Set balance control to center.
5. Set function switch to radio.
6. Set fine tuning to center.
7. Set mode switch to stereo.
8. Set power source voltage to 12 V DC.
9. Output of signal generator should be no higher than necessary to obtain an output reading.

■ LW, MW and SW ALIGNMENT

	BAND	SIGNAL GENERATOR or SWEEP GENERATOR: CONNECTIONS	SIGNAL GENERATOR or SWEEP GENERATOR: FREQUENCY	RADIO DIAL SETTING	INDICATOR (ELECTRONICS VOLTMETER or SCOPE)	ADJUSTMENT	REMARKS
		AM-IF ALIGNMENT					
(1)	MW	Fashion loop of several turns of wire and radiate signal into loop of receiver.	455 kHz 30% Mod. at 400 Hz	Point of non-interference. (on/about 600 kHz)	Output meter across voice coil.	T2 (AM IFT)	Adjust for maximum output.
		LW-RF ALIGNMENT					
(2)	LW	,,	136 kHz	Tuning capacitor fully closed.	,,	L8 (LW OSC Coil)	,,
(3)	LW	,,	297 kHz	Tuning capacitor fully open.	,,	CT7 (LW OSC Trimmer)	,,
(4)	LW	,,	145 kHz	Tune to signal.	,,	(*1) L2 (LW ANT Coil)	Adjust for maximum output. Adjust L2 by moving coil bobbin along ferrite core.
(5)	LW	,,	285 kHz	,,	,,	CT5 (LW ANT Trimmer)	Adjust for maximum output. Repeat steps (2)~(5).
		MW-RF ALIGNMENT					
(6)	MW	,,	511 kHz	Tuning capacitor fully closed.	,,	L9 (MW OSC Coil)	Adjust for maximum output.
(7)	MW	,,	1,650 kHz	Tuning capacitor fully open.	,,	CT4 (MW OSC Trimmer)	,,
(8)	MW	,,	550 kHz	Tune to signal.	,,	(*1) L3 (MW ANT Coil)	Adjust for maximum output. Adjust L3 by moving coil bobbin along ferrite core.
(9)	MW	,,	1,500 kHz	,,	,,	CT1 (MW ANT Trimmer)	Adjust for maximum output. Repeat steps (6)~(9).
	(*1) Cement antenna bobbin with wax after completing alignment.						
		SW-RF ALIGNMENT					
(10)	SW	Connect to test point ⑰ through ceramic capacitor (10 pF) Negative side to test point ⑩.	5.75 MHz	Tuning capacitor fully closed.	,,	L10 (SW OSC Coil)	Adjust for maximum output.
(11)	SW		18.8 MHz	Tuning capacitor fully open.	,,	CT8 (SW OSC Trimmer)	,,
(12)	SW		5.9 MHz	Tune to signal.	,,	L4 (SW ANT Coil)	Adjust for maximum output. Repeat steps (10)~(12).

■ FM ALIGNMENT

	BAND	SIGNAL GENERATOR or SWEEP GENERATOR: CONNECTIONS	SIGNAL GENERATOR or SWEEP GENERATOR: FREQUENCY	RADIO DIAL SETTING	INDICATOR (ELECTRONICS VOLTMETER or SCOPE)	ADJUSTMENT	REMARKS
		FM-IF ALIGNMENT					
(1)	FM	High side thru. 0.001 μF to test point ⑰, Negative side to test point ⑩.	10.7 MHz (SWP).	Point of non-interference. (on/about 90 MHz)	Connect vert. amp. of scope to test point ⑨. Negative side to test point ⑮.	T1 (FM 1st IFT)	Adjust for maximum amplitude. (Refer to fig. 19).
(2)	FM	,,	,,	,,	,,	T3 (FM 2nd IFT)	Adjust for maximum amplitude. (Refer to fig. 20).

	BAND	SIGNAL GENERATOR or SWEEP GENERATOR: CONNECTIONS	SIGNAL GENERATOR or SWEEP GENERATOR: FREQUENCY	RADIO DIAL SETTING	INDICATOR (ELECTRONICS VOLTMETER or SCOPE)	ADJUSTMENT	REMARKS
		FM-RF ALIGNMENT					
(3)	FM	Connect to test point ⑰ through FM dummy antenna. Negative side to test point ⑩.	87.5 MHz	Variable capacitor fully closed.	Output meter across voice coil.	L7 (FM OSC Coil)	(*2) Adjust for maximum output.
(4)	FM		108 MHz	Variable capacitor fully open.	,,	CT3 (FM OSC Trimmer)	,,
(5)	FM		90 MHz	Tune to signal.	,,	L5 (FM ANT Coil)	,,
(6)	FM		106 MHz	,,	,,	CT2 (FM ANT Trimmer)	(*2) Adjust for maximum output. Repeat steps (3)~(6).
	(*2) Three output responses will be present; proper tuning is the center frequency.						

■ SEPARATION ALIGNMENT

ITEM	FM SIGNAL GENERATOR SOURCE CONNECTION	EQUIPMENT CONNECTION ELECTRONIC COUNTER	ADJUSTMENT	SPECIFICATION	REMARKS
Adjustment of pilot signal.	98 MHz, 60 dB (CW) Connect to test point ⑰ through FM dummy antenna. Negative side to test point ⑩.	⑨ . . . (+) ⑮ . . . (−)	VR1	19 kHz	Adjust VR1, for 19 kHz (±100 Hz) reading on electronics counter.

■ AUDIO ADJUSTMENT

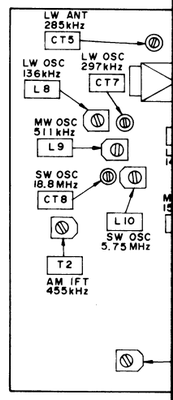
ITEM	INPUT	MEASUREMENT POINT	SPECIFICATION	ADJUSTMENT POINT	REMARKS
Azimuth	QZZCAC (10 kHz, −20 dB)	EXT SP	Maximum output.	Azimuth screw	Playback mode
Playback level	QZZCLA (315 Hz, 0 dB)	⑦ . . . (Lch) ⑨ . . . (Rch) ⑭ . . . (−)	420 mV	VR101 (Lch) VR201 (Rch)	Playback mode
Bias oscillation frequency	———	⑨ . . . (+) ⑮ . . . (−)	66.2±0.5 kHz	L301	Record mode Beat proof switch→I Tape switch→Metal
Erase current	Use metal tape	⑨ . . . (+) ⑮ . . . (−)	140 $\pm^{10}_{5}$ mV	VR301	Record mode Beat proof switch→I Tape switch→Metal
Bias current	Use metal tape	⑦ . . . (Lch) ⑨ . . . (Rch) ⑭ . . . (−)	Metal 4.0 $\pm^{0.2}_{0.4}$ mV Normal 2.0±0.2 mV	Metal VR102 (Lch) VR202 (Rch) Normal VR304	Record mode Beat proof switch→I Tape switch→Metal
Overall gain	DIN Jack f=1 kHz, −57 dB Input, Pin ① . . . (+) Lch Pin ④ . . . (+) Rch Pin ② . . . (−)	DIN Jack Output Pin ③ . . . (+) Lch Pin ⑤ . . . (+) Rch Pin ② . . . (−)	Output . . . ±0 mV	VR103 (Lch) VR203 (Rch)	1. Apply a −57 dB (1.4 mV) 1 kHz signal from the DIN input terminal. 2. Measure the output voltage of pins ⑨ and ⑫ of IC5. 3. Then, with the unit in the record mode, record a signal. 4. Playback the recorded part, and measure the output voltage of pins ⑨ and ⑫ of IC5. 5. Compare the output voltage measured in items 2 and 4, and adjust so there is no difference in the level. (Adjust to obtain 0±1 dB.) *Output voltage reference value of IC5 pins ⑨ and ⑫ . . . 380 mV.

■ LED METER ALIGNMENTS

ITEM	ADJUSTMENT	REMARKS
Level check	VR303	1. Play back the test tape (QZZCLA). 2. Adjust VR303 so that the 4th LED from the left begins to illuminate.

■ ALIGNMENT

MAIN CIRCUIT



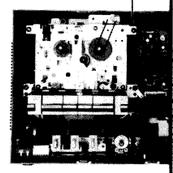


Fig. 2

	BAND	SIGNAL GENERATOR or SWEEP GENERATOR CONNECTIONS	SIGNAL GENERATOR or SWEEP GENERATOR FREQUENCY	RADIO DIAL SETTING	INDICATOR (ELECTRONICS VOLTMETER or SCOPE)	ADJUSTMENT	REMARKS
			FM-RF ALIGNMENT				
(3)	FM	Connect to test point ⑰ through FM dummy antenna. Negative side to test point ⑩.	87.5 MHz	Variable capacitor fully closed.	Output meter across voice coil.	L7 (FM OSC Coil)	(*2) Adjust for maximum output.
(4)	FM		108 MHz	Variable capacitor fully open.	〃	CT3 (FM OSC Trimmer)	〃
(5)	FM		90 MHz	Tune to signal.	〃	L5 (FM ANT Coil)	〃
(6)	FM		106 MHz	〃	〃	CT2 (FM ANT Trimmer)	(*2) Adjust for maximum output. Repeat steps (3)~(6).
	(*2) Three output responses will be present; proper tuning is the center frequency.						

■ SEPARATION ALIGNMENT

ITEM	FM SIGNAL GENERATOR SOURCE CONNECTION	EQUIPMENT CONNECTION ELECTRONIC COUNTER	ADJUSTMENT	SPECIFICATION	REMARKS
Adjustment of pilot signal.	98 MHz, 60 dB (CW) Connect to test point ⑰ through FM dummy antenna. Negative side to test point ⑩.	⑰ . . . (+) ⑱ . . . (−)	VR1	19 kHz	Adjust VR1, for 19 kHz (±100 Hz) reading on electronics counter.

■ AUDIO ADJUSTMENT

ITEM	INPUT	MEASUREMENT POINT	SPECIFICATION	ADJUSTMENT POINT	REMARKS
Azimuth	QZZCAC (10 kHz, −20 dB)	EXT SP	Maximum output.	Azimuth screw	Playback mode
Playback level	QZZCLA (315 Hz, 0 dB)	⑰ . . . (Lch) ⑱ . . . (Rch) ⑭ . . . (−)	420 mV	VR101 (Lch) VR201 (Rch)	Playback mode
Bias oscillation frequency	———	⑨ . . . (+) ⑮ . . . (−)	66.2±0.5 kHz	L301	Record mode Beat proof switch→I Tape switch→Metal
Erase current	Use metal tape	⑨ . . . (+) ⑮ . . . (−)	140 $\pm^{10}_{5}$ mV	VR301	Record mode Beat proof switch→I Tape switch→Metal
Bias current	Use metal tape	⑤ . . . (Lch) ⑥ . . . (Rch) ⑯ . . . (−)	Metal 4.0$\pm^{0.2}_{0.4}$ mV Normal 2.0±0.2 mV	Metal VR102 (Lch) VR202 (Rch) Normal VR304	Record mode Beat proof switch→I Tape switch→Metal
Overall gain	DIN Jack f=1 kHz, −57 dB Input, Pin ① . . . (+) Lch Pin ④ . . . (+) Rch Pin ② . . . (−)	DIN Jack Output Pin ③ . . . (+) Lch Pin ⑤ . . . (+) Rch Pin ② . . . (−)	Output . . . ±0 mV	VR103 (Lch) VR203 (Rch)	1. Apply a −57 dB (1.4 mV) 1 kHz signal from the DIN input terminal. 2. Measure the output voltage of pins ⑨ and ⑫ of IC5. 3. Then, with the unit in the record mode, record a signal. 4. Playback the recorded part, and measure the output voltage of pins ⑨ and ⑫ of IC5. 5. Compare the output voltage measured in items 2 and 4, and adjust so there is no difference in the level. (Adjust to obtain 0±1 dB.) *Output voltage reference value of IC5 pins ⑨ and ⑫ . . . 380 mV.

■ LED METER ALIGNMENTS

ITEM	ADJUSTMENT	REMARKS
Level check	VR303	1. Play back the test tape (QZZCLA). 2. Adjust VR303 so that the 4th LED from the left begins to illuminate.

■ ALIGNMENT POINTS *Please refer to Circuit Boad and Wiring Connection Diagram which is located test poits.

MAIN CIRCUIT BOARD

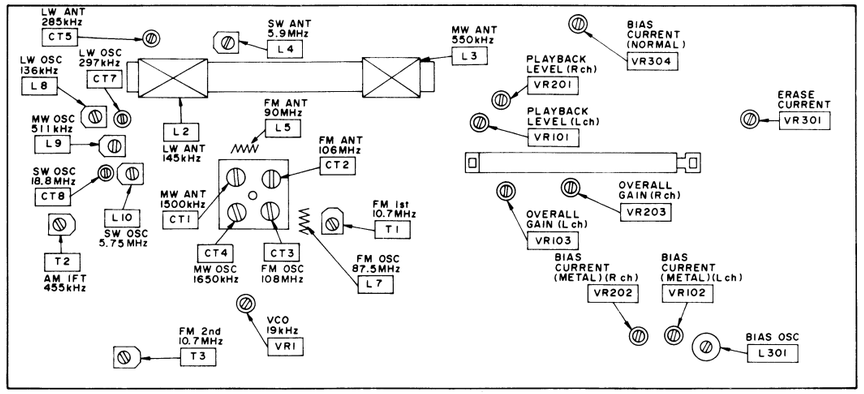


Fig. 17

METER CIRCUIT BOARD

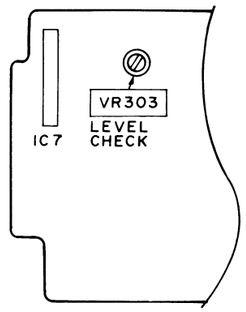


Fig. 18

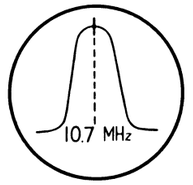


Fig. 19

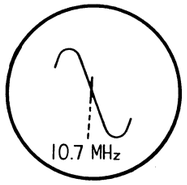


Fig. 20

MECHANISM PARTS LOCATION

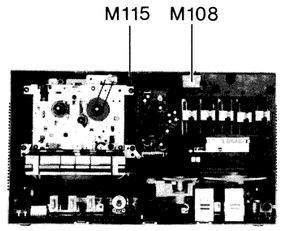


Fig. 21

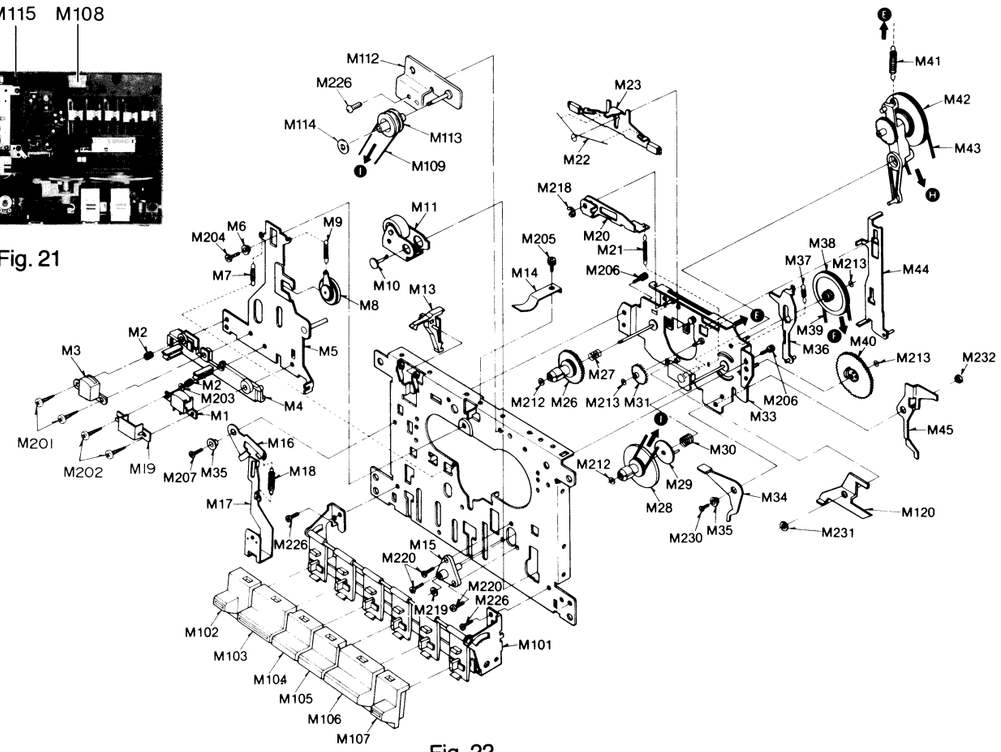
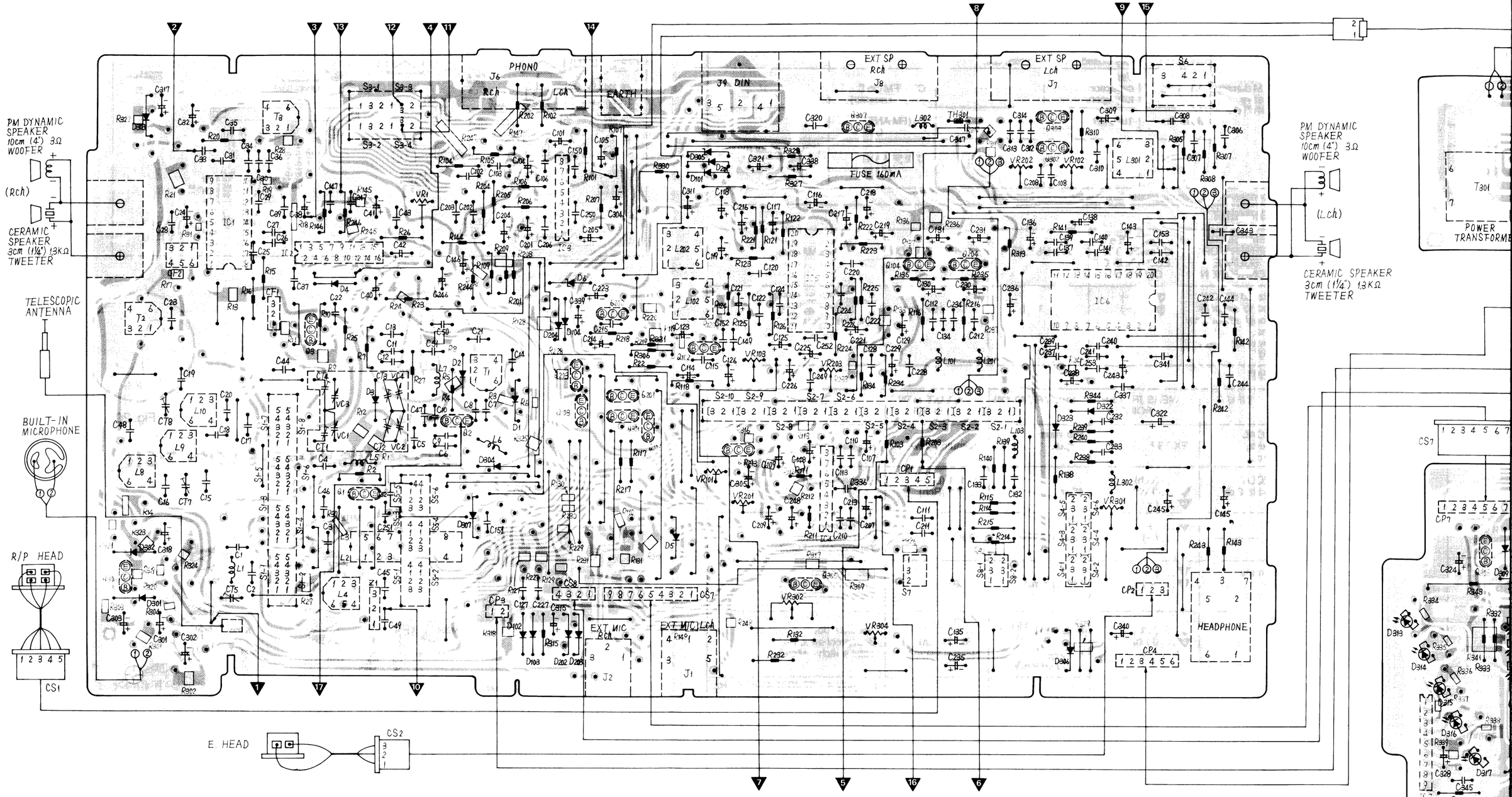


Fig. 22

CIRCUIT BOARD AND WIRING CONNECTION DIAGRAM MODEL RX-C45LS


PM DYNAMIC SPEAKER 10cm (4") 3Ω WOOFER
(Rch)
CERAMIC SPEAKER 3cm (1¼") 13KΩ TWEETER
TELESCOPIC ANTENNA
BUILT-IN MICROPHONE
R/P HEAD
CS1
E. HEAD
CS2
PHONO
J6
Rch
Lch
EARTH
J9 DIN
EXT SP Rch J8
EXT SP Lch J7
FUSE 160mA
EXT MIC Rch
EXT MIC Lch
J2
J1
S6
S7
S8
PM DYNAMIC SPEAKER 10cm (4") 3Ω WOOFER
(Lch)
CERAMIC SPEAKER 3cm (1¼") 1.3KΩ TWEETER
POWER TRANSFORMER
CS7
HEADPHONE
CP1
CP2
CP3
CP4
IC1
IC2
IC6
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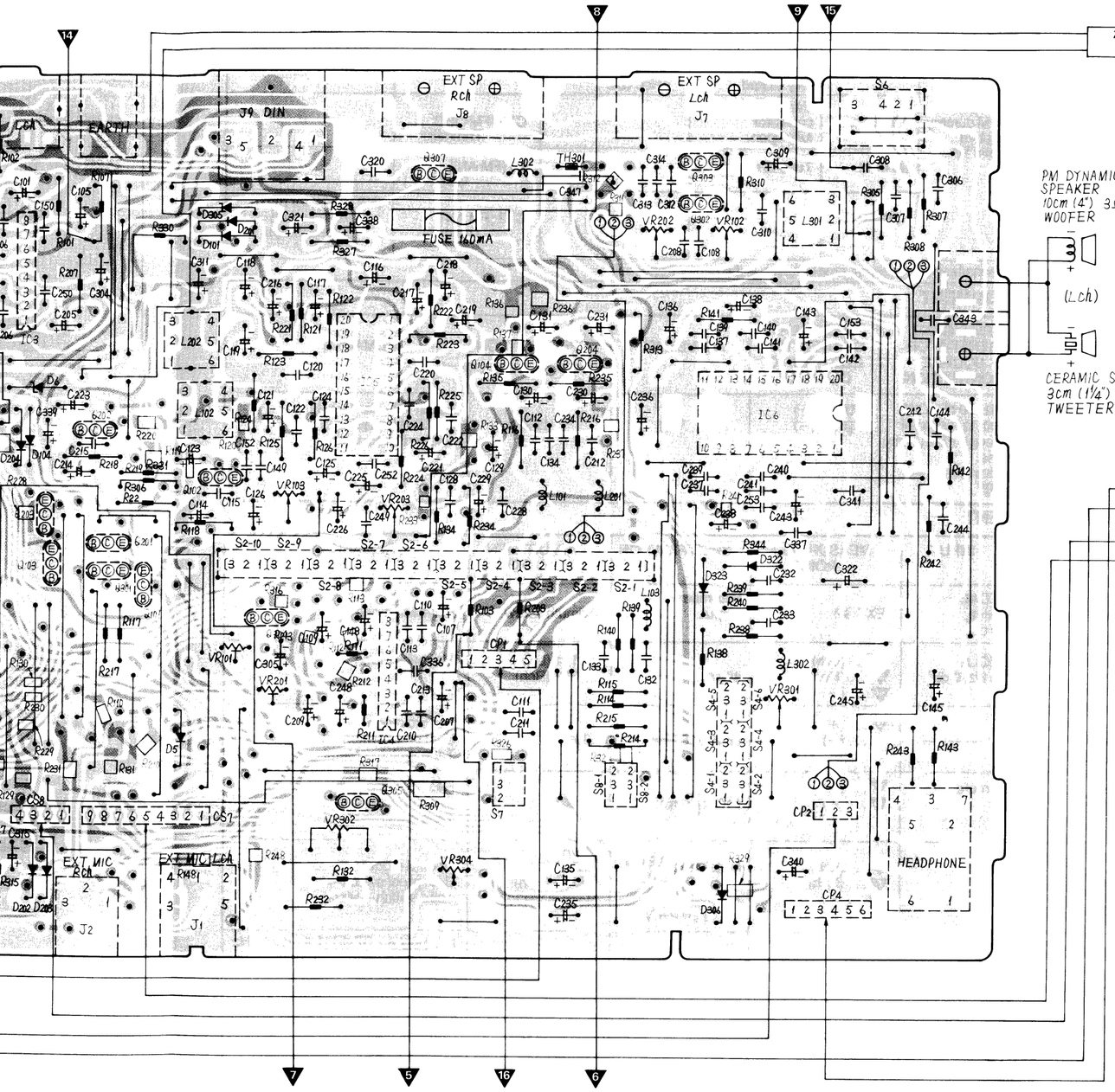
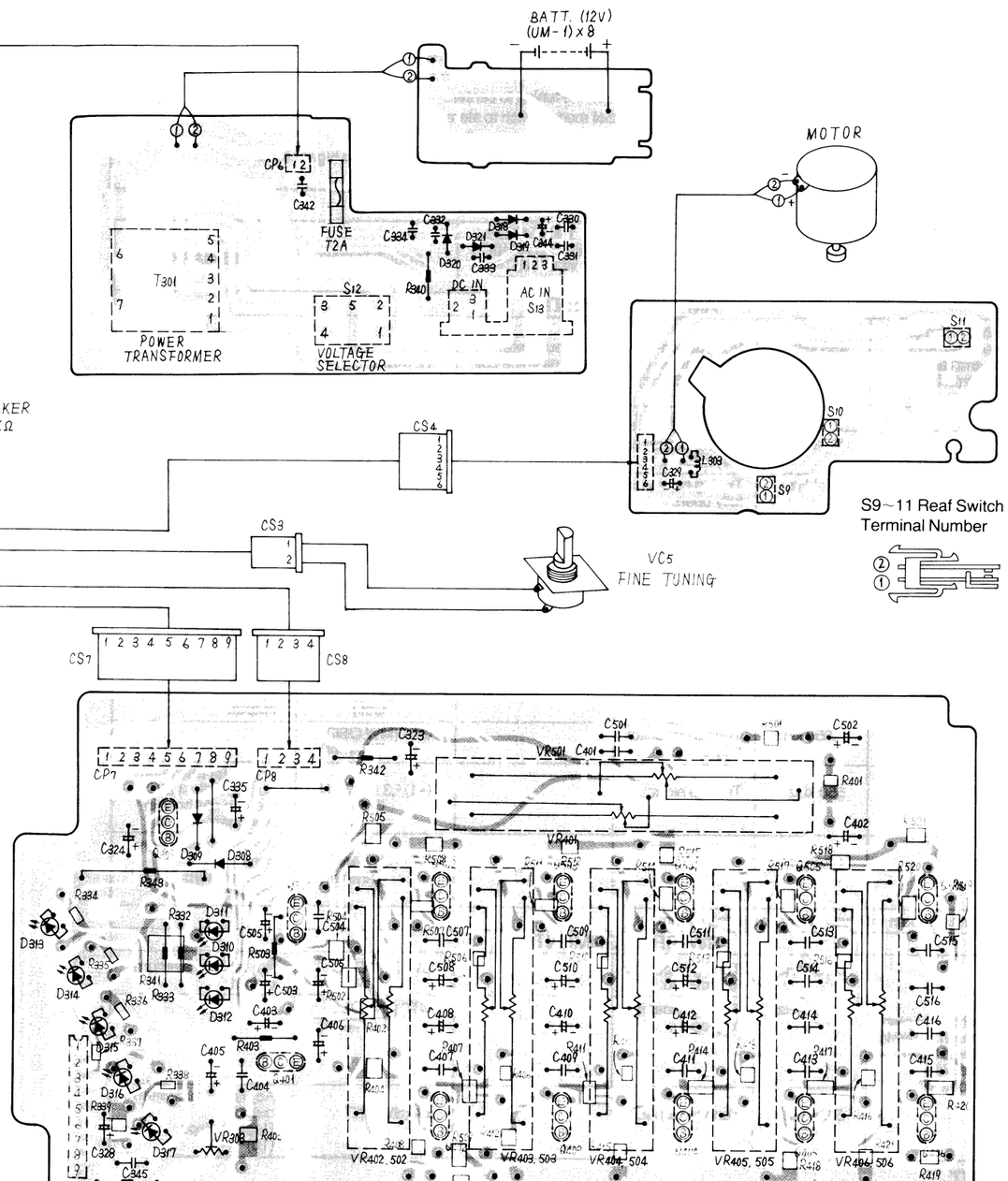
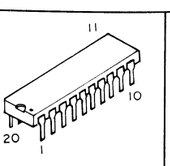
RX-C45LS

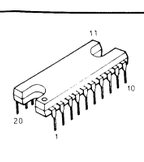
CIRCUIT BOARD AND WIRING CONNECTION DIAGRAM MODEL RX-C45LS



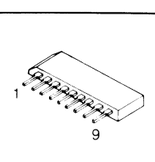




IC5

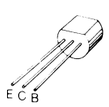


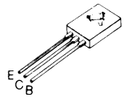
IC6



IC7

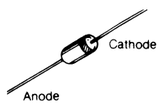
Q1, 2, 3, 101~104
201~204, 301~306
308, 401~406
501~506

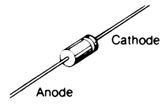




Q307

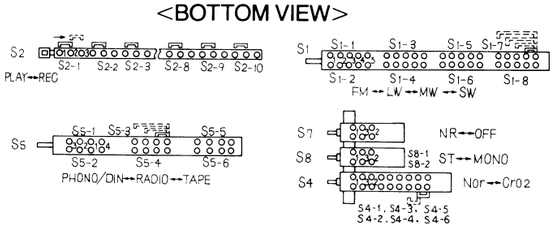
D1~6, 101~104
201~204, 301~309
322, 323





D318~321

<BOTTOM VIEW>



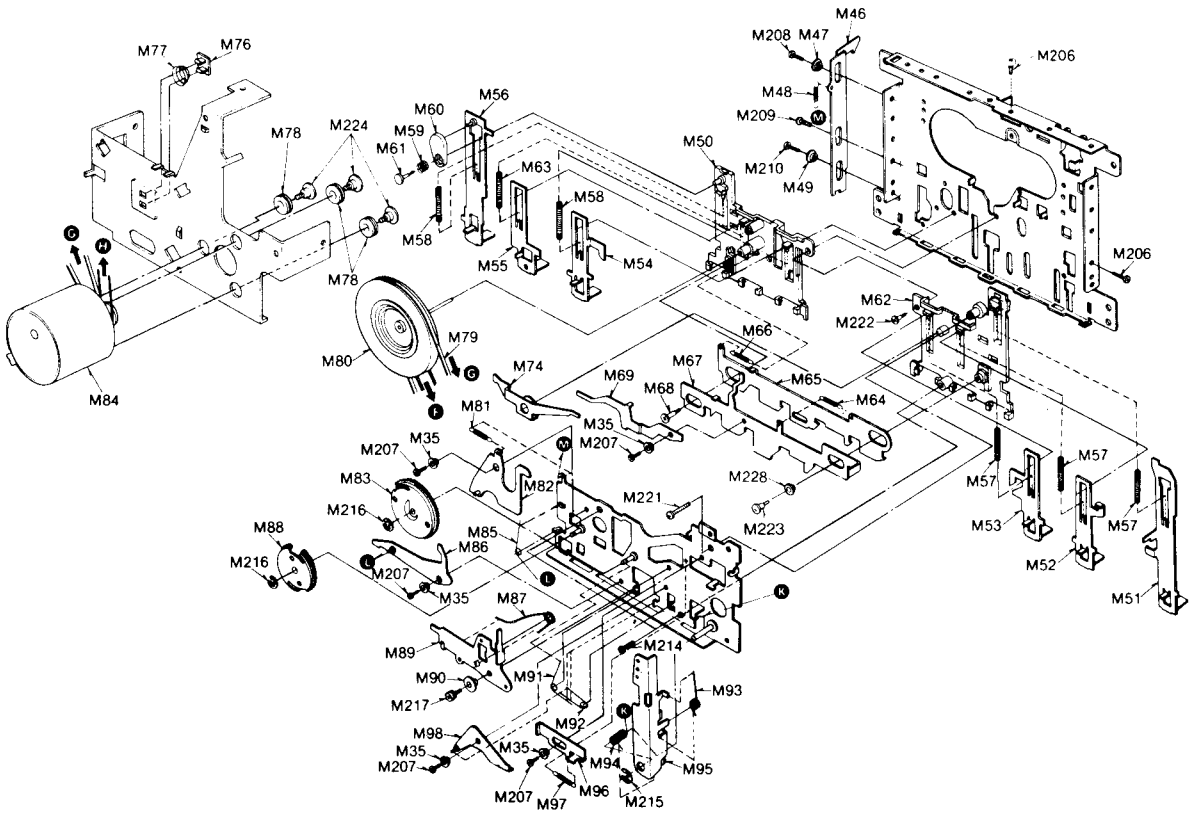


Fig. 23

Specification

Pressure of pressure roller	230~370 gr
Takeup tension	30~65 gr
Wow & flutter	Less than 0.08% (WRMS)
Tape speed fluctuation	±2%

Mechanism Operation: Full Auto Stop

■ To Remove Motor

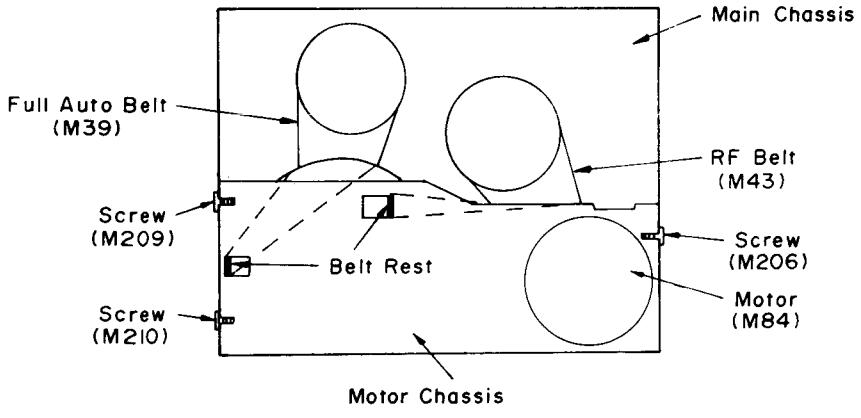


Fig. 24

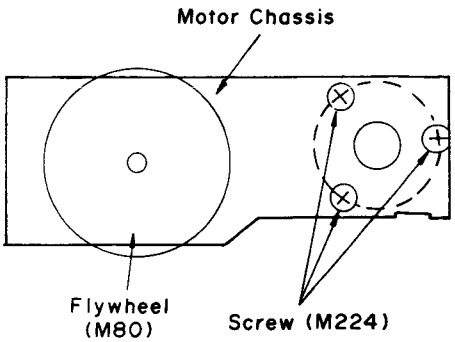


Fig. 25

1. Attach the full auto belt (M39) and RF belt (M43) to the belt rest of motor chassis.
2. Remove three (3) screws (M206, 209, 210).
3. Remove the motor chassis and the flywheel from main chassis.
4. Remove three (3) screws (M224) from motor chassis.
5. To reassemble, reverse the above procedure.

CABINET PARTS LOCATION

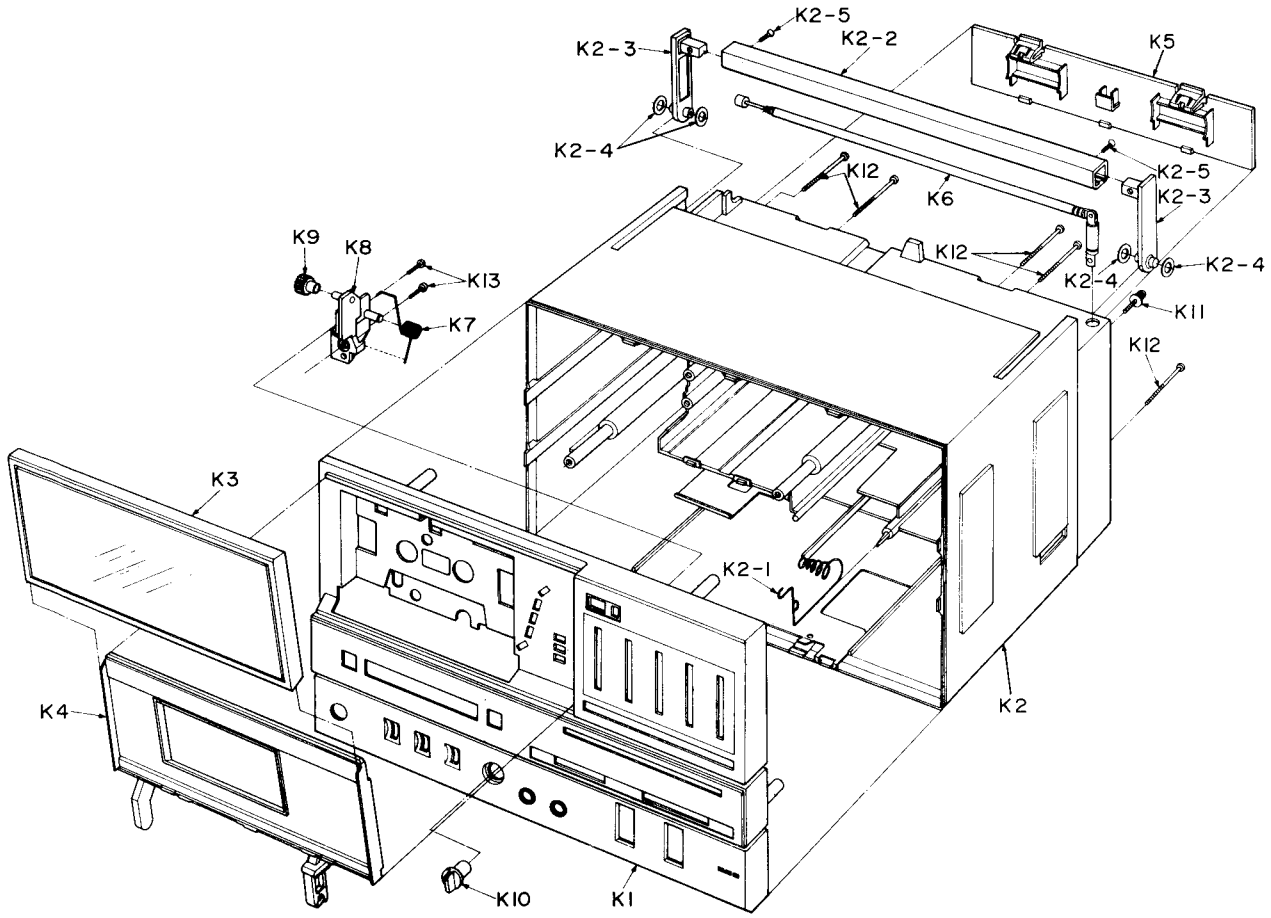


Fig. 26

Fig. 27

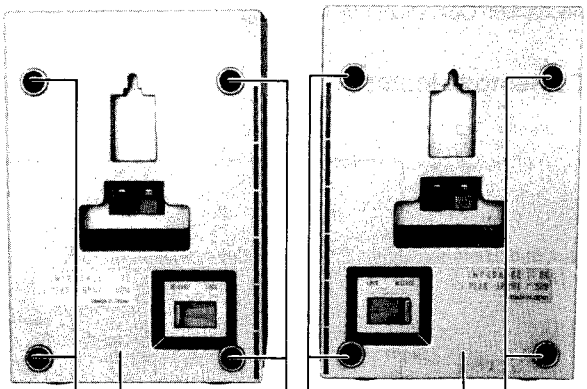


Fig. 28 Fig. 29

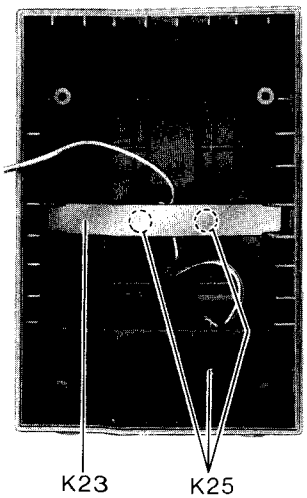


Fig. 30

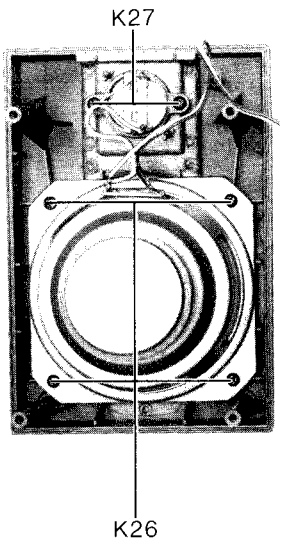


Fig. 31

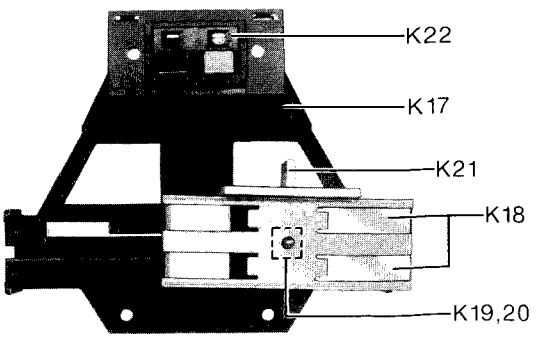


Fig. 32

ELECTRICAL PARTS LOCATION

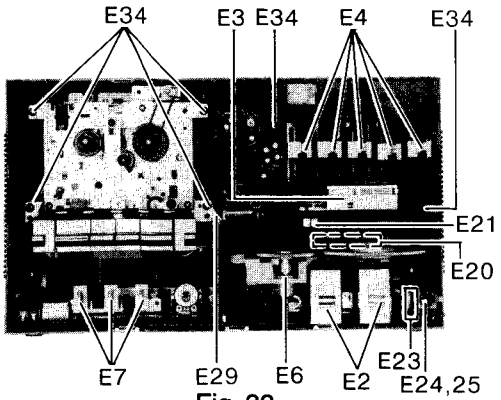


Fig. 33

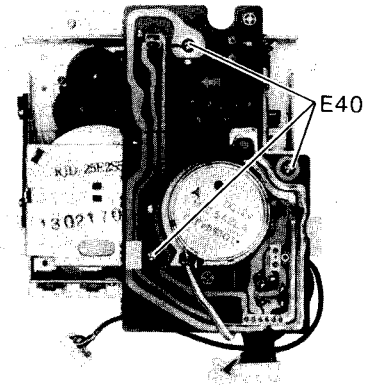


Fig. 34

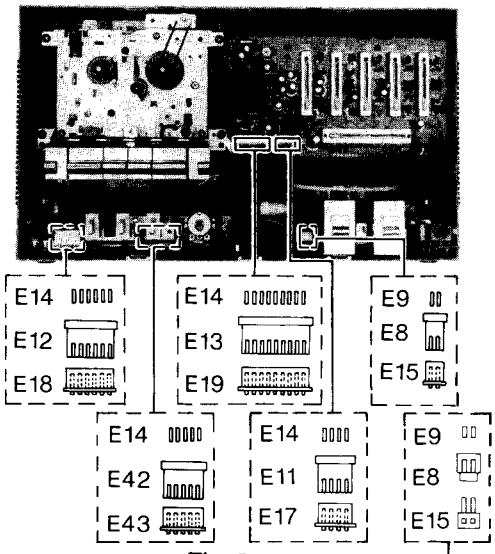


Fig. 35

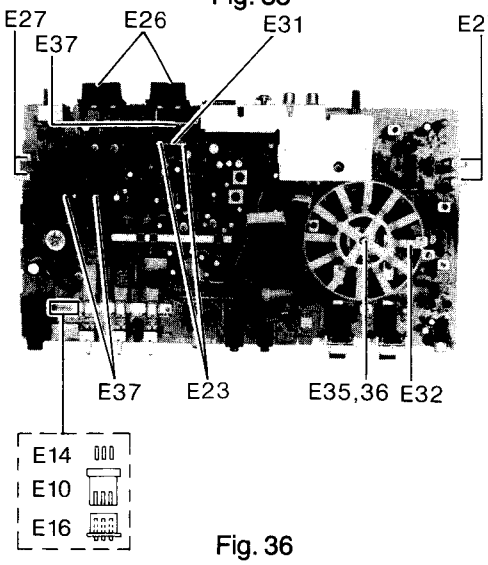


Fig. 36

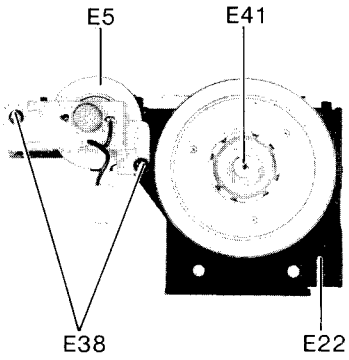


Fig. 37

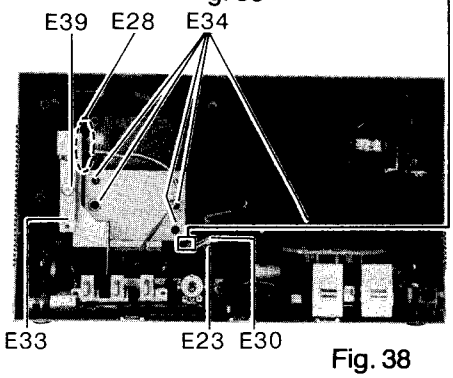


Fig. 38

■REPLACEMENT PARTS LIST·····Model RX-C45LS

(RD83052107C2)

Notes:

1. Important safety notice.
   Components identified by ⚠ mark have special characteristics important for safety.
   When replacing any of these components, use only manufacturer's specified parts.
2. The S mark indicates service standard parts and may differ from production parts.
3. RESISTORS & CAPACITORS
   Unless otherwise specified.
   All resistors are in OHMS (Ω) K=1000Ω, M=1000kΩ
   All capacitors are in MICRO FARADS (μF) P=μμF

*Type & Wattage of Resister

Type

ERC:Solid	ERX:Metal Film	ERW:Wirewound Resister
ERD:Carbon	ERG:Metal Oxide	ERS:Fusible Resister
RRD:Chip	ERO:Metal Film	ERF:Cement Resister

Wattage

10,16:1/8W	14,25:1/4W	12:1/2W	1:1W	2:2W	3:3W

*Type & Voltage of Capacitor

Type

ECFW:Semi-conductor	ECCD,ECKD,ECBT:Ceramic
ECQS:Styrol	ECQM,ECQV,ECQG:Polyester
ECUX:Chip	ECEA,ECSZ :Electrolytic
ECMS:Mica	ECQP :Polypropylene

Voltage

ECQ Type	ECQG, ECQV, Type	ECSZ Type	Others	
1H: 50V	0,5: 50V	0F:3.15V	0J :6.3V	1H,1V,50: 50V
2A:100V	1:100V	1A:10V	1A :10V	1J : 63V
2E:500V	2:200V	1V:35V	1C :16V	2A :100V
2H:500V		0J:6.3V	1E,25:25V	

Ref.No.	Part No.	Part Name & Description	Per Set
		MECHANICAL PARTS	
M1	RJH2E11Z	R/P Head	1
M2	RFS166Z	Spring, Head	2
M3	RJH7E4Z	Erase Head	1
M4	SMQ4768	Head Base	1
M5	RFD135Z	Head Base Ass'y	1
M6	SMQ4168	Spacer, Head Base Ass'y	1
M7	SMQ4770	Spring, Head Base Ass'y	1
M8	RFI18Z	Take Up Roller Bearing Ass'y	1
M9	RFS249Z	Spring, Take Up Roller Bearing Ass'y	1
M10	SMQ4774	Stopper, Pinch Roller Ass'y	1
M11	SMQ4776	Pinch Roller Ass'y	1
M13	SMQ4778	Erase Safety Lever	1
M14	SMQ4780	Spring (Cassette Pressure)	1
M15	SMQ4782	Flywheel Metal	1
M16	RFY192Z	Main Gear Operation Plate Arm	1
M17	RFY193Z	Main Gear Plate	1
M18	RFS259Z	Spring (Main Gear Operation Plate Arm	1
M19	QTS1501	Head Shield Cover	1
M20	RFY184Z	Operation Lever	1
M21	RFS250Z	Spring (Operation Lever)	1
M22	SMQ4792	Spring (Brake Arm Ass'y)	1
M23	SMQ4794	Brake Arm Ass'y	1
M26	SMQ4800	Supply Reel Table Ass'y	1
M27	SMQ4802	Spring, Supply Reel Table	1
M28	SMQ4804	Take Up Reel Table Ass'y	1

Ref. No.	Part No.	Part Name & Description	Per Set
M29	SMQ4806	Detector Lever Peace	1
M30	SMQ4808	Take Up Reel Table Spring	1
M31	SMQ4810	FF Gear	1
M33	RFU16Z	Reel Board Ass'y	1
M34	SMQ4814	T Roller Kick Lever	1
M35	SMQ4816	Spacer, T Roller Kick Lever etc.	7
M36	SMQ4818	Detector Lever	1
M37	SMQ4820	Detector Lever Spring	1
M38	SMQ4822	Pulley	1
M39	SMQ4824	Full Auto Belt	1
M40	SMQ4826	Cam Gear	1
M41	RFS271Z	RF Clatch Arm Spring	1
M42	RFG36Z	RF Clatch Arm Ass'y	1
M43	RFB25Z	RF Belt	1
M44	SMQ4832	RF Slide Lever Ass'y	1
M45	SMQ4834	Auto Lever	1
M46	RFY183Z	Eject Slide Lever	1
M47	SMQ4786	Spacer, Eject Slide Lever	1
M48	RFS103Z	Spring, Eject Slide Lever	1
M49	SMQ4788	Spacer, Eject Slide Lever	1
M50	SMQ4836	Button Base (L)	1
M51	SMQ4844	Record Button Lever	1
M52	SMQ4846	Playback Button Lever	1
M53	SMQ4848	REW Button Lever	1
M54	SMQ4850	FF Button Lever	1
M55	SMQ4852	Stop, Eject Button Lever	1
M56	SMQ4854	Pause Button Lever Ass'y	1
M57	SMQ4856	Button Lever Spring, R/P, REW	2
M58	SMQ4858	Button Lever Spring, FF, Pause	2
M59	SMQ4860	Spring, Pause Lever	1
M60	SMQ2444	Pause Lever	1
M61	SMQ4862	Stopper	1
M62	SMQ4840	Button Base (R)	1
M63	RFS258Z	Button Lever Spring, Stop/Eject	2
M64	RFS252Z	Pressure Button Operation Plate Spring	1
M65	RFY185Z	Pressure Button Operation Plate	1
M66	RFS253Z	Switch Operation Plate Spring	1
M67	SMQ4868	Switch Operation Plate	1
M68	SMQ4870	Screw	1
M69	SMQ4872	Eject Kick Lever	1
M74	SMQ4842	Record Stopper	1
M76	SMQ4920	Flywheel Plate	1
M77	SMQ4922	Damper Spring	1
M78	SMQ4916	Motor Rubber	3
M79	RFB26Z	Flywheel Belt	1
M80	SMQ4900	Flywheel Ass'y	1
M81	SMQ4908	REW Spring	1
M82	SMQ4906	Pause Arm Ass'y	1
M83	SMQ4894	Main Gear	1
M84	RFM21Z	Motor Ass'y	1
M85	SMQ4904	Pause Trigger Arm Spring	1
M86	SMQ4902	Pause Trigger Arm Ass'y	1
M87	RFS248Z	Lift Arm Spring	1
M88	SMQ4896	Pause Gear	1
M89	RFY212Z	Lift Arm Ass'y	1
M90	SMQ4910	Lift Arm Spacer	1
M91	SMQ4890	Main Trigger Arm Spring	1
M92	SMQ4888	Main Gear Spring	1
M93	RFS256Z	Record Damper Spring	1
M94	SMQ4886	Record Operation Arm Spring	1
M95	RFY213Z	Record Operation Arm	1
M96	RFY186Z	Record Operation Plate	1
M97	RFS254Z	Record Operation Plate Spring	1
M98	SMQ4892	Main Trigger Arm Ass'y	1
M101	RME316Z	Button Frame Ass'y	1
M102	RBC457Z	Record Button	1
M103	RBC458Z	Playback Button	1
M104	RBC459Z	REW Button	1
M105	RBC460Z	FF Button	1
M106	RBC461Z	Stop/Eject Button	1
M107	RBC462Z	Pause Button	1
M108	RSE94Z	Counter	1
M109	RDV14Z	Counter Belt	1
M112	RZUXC45N	Pulley Bracket Ass'y	1
M113	RDR51Z	Counter Belt Roller	1
M114	RNW230A	Washer	1
M115	RDV15Z	Counter Belt	1
M120	SMQ4940	Kick Lever	1
M201	XSN2+6	Screw, Erase Head M'tg	2 S
M202	XSN2+7	Screw, R/P Head	2
M203	RFN72Z	Washer, R/P Head	1
M204	XSN26+4	Screw, Head Panel Ass'y M'tg	1 S
M205	XTN26+3H	Screw, Cassette Pressure M'tg	1
M206	XYN2+4F	Screw, Leaf Board, etc. M'tg	4
M207	XSS2+25	Screw, Eject Kick Lever, etc. M'tg	6
M208	XYN26+5F	Screw, Eject Slide Lever M'tg	1
M209	XSN2+4	Screw, Eject Slide Lever M'tg	1
M210	XYN2+6F	Screw, Eject Slide Lever M'tg	1
M212	SMQ4928	Washer, Reel Table	2
M213	SMQ4930	Washer, FF Gear, etc. M'tg	3
M214	RFE71Z	Screw, Sub Chassis M'tg	2
M215	XUC3FT	Circlip, Record Operation Arm M'tg	1 S
M216	XUC2FT	Circlip, Main, Pause Gear M'tg	2 S
M217	XYN26+6F	Screw, Lift Arm Ass'y M'tg	1
M218	XUC15FT	E Ring, Operation Lever M'tg	1 S
M219	SMQ4932	Washer, Flywheel Metal	1
M220	XSS2+3	Screw, Flywheel Metal M'tg	3 S
M221	RFE74Z	Screw, Sub Chassis M'tg	1
M222	SMQ4838	Screw, Button Base Right M'tg	1
M223	SMQ4878	Screw, Eject Kick Lever	1
M224	SMQ4918	Screw, Motor Ass'y M'tg	3
M226	XTV26+4F	Screw, Button Frame etc. M'tg	3
M228	RFN73Z	Washer, Operation Plate	1
M230	SMQ4944	Screw, Take Up Roller Kick Lever M'tg	1
M231	XUC12FT	Circlip, Kick Lever M'tg	1 S
M232	SMQ4938	Nut, Auto Lever M'tg	1
M233	XYN2+C6	Screw, FF/REW Lever M'tg	1
		INTEGRATED CIRCUITS, TRANSISTORS AND DIODES	
IC1	AN7226	IC	1
IC2	AVIBA1356	IC	1
IC3	AVIBA328MR	IC	1
IC4	RVIBA328	IC	1
IC5	RVILM1131C	IC	1

RX-C45LS FRANÇAIS

■ SPECIFICATIONS

Généralités:

Alimentation:	c.a. 110 à 115/115 à 127/200 à 220/230 à 250 V, 50/60 Hz Piles: 12 V (huit piles sèches de dimension D) (National UM-1 ou équivalent) Batterie pour automobile: avec adaptateur RP-952 automobile en option
Consommation:	36 W (C.A. seulement)
Puissance de sortie:	15 W (7,5 W×2) . . . RMS (max.) 20 W (10 W×2) . . . MPO
Enceinte acoustique:	Haut-parleur des graves: haut-parleur dynamique 10 cm à aimant fixe (3Ω) Haut-parleur des aigus: 3 cm haut-parleur à aimant permanent (1,3 kΩ)
Entrée:	MIC: sensibilité 0,26 mV: impédance applicable pour microphone 200 à 600Ω PHONE: sensibilité 2,5 mV/47 kΩ ou plus DC IN: 13,2 V
Sortie:	EXT SP: 3 à 8Ω HEADPHONE: 8Ω
Branchement REC/PB:	fiche DIN à 5 broches: IN: sensibilité 0,3 mV/3,3 kΩ ou plus OUT: sortie 360 mV/4,7 kΩ ou moins
Dimensions (l×h×Pr) cm:	Total grandeur 53,7×17,6×18,3 ($21^{5}/_{32}\times6^{15}/_{16}\times7^{7}/_{32}$)'' Principal 30,4×17,6×18,3 ($11^{31}/_{32}\times6^{15}/_{16}\times7^{7}/_{32}$)''
	Parleur boîte 11,8×17,6×14,8 ($4^{21}/_{32}\times6^{15}/_{16}\times5^{13}/_{16}$)''
Poids kg:	5,4 sans piles

Section radio:

Gamme de fréquence radio:	FM: 87,5 à 108 MHz GO: 150 à 285 kHz (2000 à 1060 m) PO: 520 à 1610 kHz (577 à 186 m) OC: 5,9 à 18 MHz (50,8 à 16,7 m)
Fréquence intermédiaire:	FM: 10,7 MHz AM (GO/PO/OC): 455 kHz
Sensibilité:	FM: 1,5 μV (−3 dB Seuil de sensibilité) GO: 100μV/m pour une sortie de 50 mW PO: 50μV/m pour une sortie de 50 mW OC: 4μV pour une sortie de 50 mW

Section platine magnétophone:

Réponse de fréquence:	60 à 12,000 Hz (avec bande normale) 60 à 15,000 Hz (avec bande Métal)
Système d'enregistrement:	Polarisation C.A., effacement C.A.
Vitesse de bande:	4,8 cm/sec.
Pleurage et scintillement:	0.08% (WRMS)
Durée de lecture:	1 heure avec cassette C-60
Pistes:	Enregistrement et lecture stéréo 4 pistes, 2 canaux

Ces spécifications sont sujettes à des changements sans préavis.

SYMBOLES UTILISES DANS SCHEMA

Remarques:

1. S1-1~S1-8: Sélecteur de gamme d'onde en position "FM". (1 . . . "FM", 2 . . . "LW", 3 . . . "MW", 4 . . . "SW")
2. S2-1~S2-10: Commutateur enregistrement/lecture en position "playback". (1 . . . Lecture, 3 . . . Enregistrement)
3. S3-1~S3-4: Commutateur "Phono/DIN" en position "PHONO". (1 . . . Phono, 2 . . . DIN)
4. S4-1~S4-6: Sélecteur de bande en position "NORMAL". (1 . . . "NORMAL", 2 . . . "METAL")
5. S5-1~S5-6: Commutateur de fonction en position "OFF/TAPE". (1 . . . "DIN/PHONO", 2 . . . "RADIO", 3 . . . "OFF/TAPE")
6. S6: Interrupteur de suppression de battement. (1 . . . I, 2 . . . II, 3 . . . III)
7. S7: Commutateur du réducteur de bruit Dolby en position "IN".
8. S8-1, S8-2: Commutateur de stéréo-mono en position "STEREO". (1 . . . "MONO", 2 . . . "STEREO").
9. S9: Commutateur "ON/OFF" du moteur en position "OFF".
10. S10: Commutateur "ON/OFF" du commutateur lecture en position "OFF".
11. S11: Touche "ON/OFF" du commutateur d'avance rapide-rebobinage en position "OFF".
12. S12: Sélecteur de tension.
13. S13: Sélecteur C.A./C.C. en position "DC IN".
14. VR1: Réglage de fréquence de l'oscillateur VCO.
15. VR101, 201: Régulateur de tension de réglage de gain de lecture.
16. VR102, 202, 304: Régulateur de tension de réglage du courant de polarisation.
17. VR103, 203: Régulateur de tension de réglage de gain total.
18. VR301: Régulateur de tension de réglage du courant d'effacement.
19. VR302: Commande de balance.
20. VR303: Régulateur de tension de réglage des indicateurs à DEL.
21. VR401, 501: Potentiomètre de volume.
22. VR402~406, 502~506: Commandes d'égaliseur graphique.
23. La marque (▼) signale un point de vérification. Ex.: ▼ = point de vérification 1.
24. La marque (※) signale une résistance imprimée.
25. La tension C.C. est mesurée au moyen d'un voltmètre électronique à partir de la borne négative de la pile.
    < > . . . Position FM, ( ) . . . Position AM,
    [ ] Position Enregistrement, Non marque . . . Position Lecture.
26. Courant des piles: Pas de signal . . . . . 151 mA
    Sortie maximum (Radio) 1.26A
    Sortie maximum (Bande) 1.32A
27. Remarque importante concernant la sécurité
    Les pièces marquées ⚠ ont des caractéristiques spéciales, importantes pour la sécurité.
    Lors du remplacement d'une de ces pièces, n'utiliser que les pièces spécifiées par le fabricant.

ALIGNEMENTS

■ INSTRUCTIONS D'ALIGNEMENT

AVANT DE PROCEDER AUX ALIGNEMENTS, LIRE ATTENTIVEMENT CE QUI SUIT

1. Placer le potentiomètre de volume au maximum.
2. Placer le commandes d'égaliseur graphique en centre.
3. Placer le sélecteur de bande sur GO, PO, DC ou FM.
4. Placer la commande de balance au centre.
5. Placer le sélecteur de fonctions sur "radio".
6. Placer la commande de syntonisation fine sur sa position centrale.
7. Placer le sélecteur de stéréo/mono sur "stéréo".
8. Régler la tension sur 12 V C.C.
9. Régler la sortie du générateur étalonné de façon à ne pas surcharger les circuits.

■ ALIGNEMENT GO, PO, et OC

	BANDE	GENERATEUR ETALONNE ou GENERATEUR DE BALAYAGE		POSITION DE L'AIGUILLE SUR LE CADRAN	INDICATEUR (VOLTMETRE ou OSCILLOSCOPE ELECTRONIQUES)	REGLAGE	OBSERVATIONS
		BRANCHEMENTS	FREQUENCE				
	ALIGNEMENT IF sur AM						
(1)	PO	Faire une boucle de plusieurs tours de fil et émettre ls signal dans la boucle du récepteur.	455 kHz (modulation de 30% à 400 Hz)	Point de non-interférence. (à/ environ 600 kHz)	Voltmètre branché à la bobine oscillatrice.	T2 (AM IFT)	Régler pour une sortie maximum.
	ALIGNEMENT HF sur GO						
(2)	GO	〃	136 kHz	Condensateur variable totalement fermé.	〃	L8 (bobine d'oscillateur GO)	〃
(3)	GO	〃	297 kHz	Condensateur variable ouvert à fond.	〃	CT7 (trimmer d'oscillateur GO)	〃
(4)	GO	〃	145 kHz	Syntoniser sur le signal.	〃	(*1) L2 (bobine d'antenne GO)	Régler pour une sortie maximum en glissant la bobine L2 le long du noyau en ferrite.
(5)	GO	〃	285 kHz	〃	〃	CT5 (trimmer d'antenne GO)	Régler pour une sortie maximum. Refaire les étapes (2) à (5).
	ALIGNEMENT HF sur PO						
(6)	PO	〃	511 kHz	Condensateur variable totalement fermé.	〃	L9 (bobine d'oscillateur PO)	Régler pour une sortie maximum.
(7)	PO	〃	1,650 kHz	Condensateur variable ouvert à fond.	〃	CT4 (trimmer d'oscillateur PO)	〃
(8)	PO	〃	550 kHz	Syntoniser sur le signal.	〃	(*1) L3 (bobine d'antenne PO)	Régler pour une sortie maximum en glissant la bobine L3 le long du noyau en ferrite.
(9)	PO	〃	1,500 kHz	〃 signal.	〃	CT1 (trimmer d'antenne PO)	Régler pour une sortie maximum. Refaire les étapes (6) à (9).
	(*1) Sceller la bobine d'antenne à la cire après avoir achevé l'alignement.						
	ALIGNEMENT HF sur OC						
(10)	OC	Brancher au point ▼ par un condensateur en céramique (10 pF) Côté nétagif au point ▼.	5,75 MHz	Condensateur variable totalement fermé.	〃	L10 (bobine d'oscillateur OC)	Régler pour une sortie maximum.
(11)	OC		18,8 MHz	Condensateur variable ouvert à fond.	〃	CT8 (trimmer d'oscillateur OC)	〃
(12)	OC		5,9 MHz	Syntoniser sur le signal.	〃	L4 (bobine d'antenne OC)	Régler pour une sortie maximum. Refaire les étapes (10) à (12).

■ ALIGNE

BANDE	
(1)	FM
(2)	FM
(3)	FM
(4)	FM
(5)	FM
(6)	FM

(*2) Il y

■ ALIGNE

ELEME	
Réglage du signal pilote.	

■ ALIGNEMENT FM

	BANDE	GENERATEUR ETALONNE ou GENERATEUR DE BALAYAGE		POSITION DE L'AIGUILLE SUR LE CADRAN	INDICATEUR (VOLTMETRE ou OSCILLOSCOPE ELECTRONIQUES)	REGLAGE	OBSERVATIONS
		BRANCHEMENTS	FREQUENCE				
		ALIGNEMENT IF sur FM					
(1)	FM	Brancher au point ⑰ via 0,001 μF. Côte négatif au point ⑯.	10,7 MHz (SWP.)	Point de non-interférence. (à/environ 90 MHz)	Brancher la sonde vert. de l'oscilloscope au point ⑨. Côté négatif au point ⑮.	T1 (FM 1ère IFT)	Régler pour une amplitude maximum. (Voir fig. 19)
(2)	FM	〃	〃	〃	〃	T3 (FM 2ème IFT)	Régler pour une amplitude maximum. (Voir fig. 20.)
		ALIGNEMENT HF sur FM					
(3)	FM	Brancher au point ① via une antenne fictive FM. Côté négatif au point ⑯.	87,5 MHz	Condensateur variable totalement fermé.	Voltmètre branché à la bobine oscillatrice.	L7 (bobine d'oscillateur FM)	(*2) Régler pour une sortie maximum.
(4)	FM		108 MHz	Condensateur variable ouvert à fond.	〃	CT3 (trimmer d'oscillateur FM)	〃
(5)	FM		90 MHz	Syntoniser sur le signal.	〃	L5 (bobine d'antenne FM)	〃
(6)	FM		106 MHz	〃	〃	CT2 (trimmer d'antenne FM)	(*2) Régler pour une sortie maximum. Refaire les étapes (3) à (6).
	(*2) Il y aura trois réponses de sortie; la syntonisation adéquate est la fréquence du milieu.						

■ ALIGNEMENT DE LA SEPARATION

ELEMENT	GENERATEUR DE SIGNAUX FM BRANCHEMENT SUR LA SOURCE	BRANCHEMENT A L'EQUIPMENT (COMPTEUR ELECTRONIQUE)	REGLAGE	SPECIFICATION	REMARQUES
Réglage du signal pilote.	98 MHz, 60 dB Brancher au point de coupure ① par l'intermédiaire d'une antenne FM fictive. Côté négatif au point de coupure ⑯.	① . . . (+) ⑮ . . . (−)	VR1	19 kHz	Régler VR1 pour 19 kHz (±100 Hz) en effectuant la lecture sur le compteur électronique.

■ ALIGNEMENTS AUDIO

ELEMENT	ENTREE	POINT DE MESURE	SPECIFICATION	POINT DE REGLAGE	OBSERVATIONS
Azimut	QZZCAC (10 kHz, −20 dB)	EXT SP	Régler pour une sortie maximum.	Vis d'azimut	Mode de lecture
Niveau de lecture	QZZCLA (315 Hz, 0 dB)	⑦ . . . (canal gauche) ⑧ . . . (canal droit) ⑭ . . . (−)	420mV	VR101 (canal gauche) VR201 (canal droit)	Mode de lecture
Fréquence d'oscillation de polarisation	———	⑨ . . . (+) ⑮ . . . (−)	66,2±0,5 kHz	L301	Mode d'enregistrement Interrupteur anti-battement→I Sélecteur de bande . . . METAL
Courant d'effacement	Utiliser une bande METAL.	⑨ . . . (+) ⑮ . . . (−)	140±10/5 mV	VR301	Mode d'enregistrement Interrupteur anti-battement→I Sélecteur de bande . . . METAL
Courant de polarisation	Utiliser une bande METAL.	⑤ . . . (canal gauche) ⑥ . . . (canal droit) ⑯ . . . (−)	Métal 4,0±0,2/0,4 mV Normal 2,0±0,2 mV	Métal VR102 (canal gauche) VR202 (canal droit) Normal VR304	Mode d'enregistrement Interrupteur anti-battement→I Sélecteur de bande . . . METAL
Gain total	Prise DIN f = 1 kHz, −57 dB Input Pin① . . . (+) canal gauche Pin④ . . . (+) canal droit Pin② . . . (−)	Prise DIN Output Pin③ . . . (+) canal gauche Pin⑤ . . . (+) canal droit Pin② . . . (−)	Output . . . ±0 mV	VR103 (canal gauche) VR203 (canal droit)	1. Appliquer un signal de 1 kHz −57 dB (1.4 mV) à la borne d'entrée DIN. 2. Mesurer la tension de sortie des pointes ⑨ et ⑫ du circuit intégré IC5. 3. Placer l'appareil en mode d'enregistrement et enregistrer un signal. 4. Reproduire le signal enregistré à l'étape précédente et mesurer la tension de sortie des pointes ⑨ et ⑫ du circuit intégré IC5. 5. Comparer les mesures de tension de sortie effectuées aux étapes 2 et 4 régler pour qu'il n'y ait plus de différence de niveau. (Régler pour obtenir 0± 1 dB.) *Valeur de référence de la tension de sortie des pointes ⑨ et ⑫ du circuit intégré IC5 . . . 380 mV

■ ALIGNEMENTS DES VU-METRES DEL

ELEMENT	REGLAGE	REMARQUES
Contrôle du niveau	VR303	1. Lecture de la cassette de contrôle (QZZCLA). 2. Régler le VR303 de façon à ce que la 4ème DEL à partir de la gauche commence à s'allumer.

RX-C45LS DEUTSCH

■ TECHNISCHE DATEN

Allgemeines:

Stromversorgung:	Wechselstrom: 110~115/115~127/ 200~220/230~250 V, 50/60 Hz Batterien: 12 V (acht Trockenbatterien der Größe "D": National UM-1 o.ä.) Kraftwagenbatterie: über den Kraftwagenadaptor RP-952 (Sonderzubehör) anschließbar
Leistungsaufnahme:	36 W (bei Netzbetrieb)
Ausgangsleistung:	max. 15 W (2×7,5 W) eff. MPO. 20 W (10 W×2)
Lautsprecher:	Tieftonlautsprecher: dynamischer PM-Lautsprecher, ∅10 cm (3Ω) Hochtonlautsprecher: keramischer Lautsprecher, ∅3 cm (1,3 kΩ)
Eingangsspannungen:	MIC: Empfindlichkeit 0,26 mV, Mikrofon-impedanz 200~600Ω PHONO: Empfindlichkeit 2,5 mV/mind. 47 kΩ DC IN: 13,2 V
Ausgangsimpedanzen:	EXT SP: 3~8Ω HEADPHONES: 8Ω
REC/PB-Anschlußbuchse:	5-polige DIN-Buchse IN: Empfindlichkeit 0,3 mV/mind. 3,3 kΩ OUT: Ausgangspegel 360 mV/max. 4,7 kΩ
Abmessungen (B×H×T):	Gesammtsumme Grösse 537×176×183 mm Hauptsächlich 304×176×183 mm Lautsprecher Schachtel 118×176×148 mm
Gewicht (ohne Batterien):	5,4 kg

Empfangsteil:

Wellenbereiche:	UKW: 87,5~108 MHz LW: 150~285 kHz (2000~1060 m) MW: 520~1610 kHz (577~186 m) KW: 5,9~18 MHz (50,8~16,7 m)
Zwischenfrequenz:	UKW: 10,7 MHz LW/MW/KW: 455 kHz
Empfindlichkeit:	UKW: 1,5μV (−3 dB, Grenzempfindlichkeit) LW: 100μV/m bei 50 mW Ausgangsleistung MW: 50μV/m bei 50 mW Ausgangsleistung KW: 4μV bei 50 mW Ausgangsleistung

Tonbandteil:

Frequenzgang:	60~12,000 Hz (Normalband) 60~15,000 Hz (Reineisenband)
Aufnahmesystem:	Wechselstrom-Vormagnetisierung, Wechselstromlöschung
Bandgeschwindigkeit:	4,8 cm/s
Gleichlaufschwankungen:	0,08% bewertet (WRMS)
Spieldauer:	1 Stunde mit Cassette C-60
Spurlage:	Stereoaufnahme und -wiedergabe auf 4 Spuren/2 Kanälen

Änderungen vorbehalten.

BEZEICHNUNGEN IN DER SCHEMATISCHEN DARSTELLUNG

Bemerkungen:

1. S1-1~S1-8: Wellenbereichsschalter auf „FM". (1=FM, 2=LW, 3=MW, 4=SW)
2. S2-1~S2-10: Aufnahme-/Wiedergabeschalter auf „Wiedergabe". (1 . . . Wiedergabe, 3 . . . Aufnahme)
3. S3-1~S3-4: Phono/DIN schalter auf "Phono". (1 . . . Phono, 2 . . . DIN)
4. S4-1~S4-6: Bandsortenwähler auf „NORMAL". (1=NORMAL, 2=METAL)
5. S5-1~S5-6: Funktionsschalter auf „OFF/TAPE". (1 . . . DIN/PHONO, 2=RADIO, 3=OFF/TAPE)
6. S6: Schalter zum Unterdrücken von Interferenzpfeifen. (1 . . . I, 2 . . . II, 3 . . . III)
7. S7: Dolby-Rauschunterdrückungsschalter auf „IN".
8. S8-1, S8-2: Betriebsart auf „STEREO". (1=MONO, 2=STEREO)
9. S9: EIN/AUS-Schalter des Motors auf „OFF".
10. S10: Wiedergabetaste auf „OFF".
11. S11: Schnellvorlauf-, Rückspultaste auf „OFF".
12. S12: Netzspannungswähler.
13. S13: Wahlschalter für Gleichstrom- oder Wechseistrombetrieb auf „DC IN".
14. VR1: Einstellung der spannungsgesteuerten Oszillatorfrequenz.
15. VR101, 201: Spannungsregler zur Einstellung der Wiedergabeverstärkung.
16. VR102, 202, 304: Spannungsregler zur Einstellung des Vormagnetisierstroms.
17. VR103, 203: Spannungsregler zur Einstellung der Gesamtverstärkung.
18. VR301: Spannungsregler zur Einstellung des Löschstroms.
19. VR302: Balanceregler.
20. VR303: LED-Anzeigenabgleich.
21. VR401, 501: Lautstärkeregler.
22. VR402~406, 502~506: Regler für graphische Entzerrung.
23. Die Markierung (▼) bezeichnet einen Meßpunkt, z.B. ▼ =Meßpunkt 1.
24. Die Markierung (※) bezeichnet einen gedruckten Widerstand.
25. Alle Gleichspannungen sind mit einem Elektronikvoltmeter vom negativen Batterieanschluß aus zu messen.
    < > . . Stellung „FM", ( ) . . . Stellung „AM",
    [ ] . . . Stellung „Aufnahme",
    Nein Merkmal . . . Stellung „Wiedergabe".
26. Batteriestrom: ohne Signal . . . . . 151 mA
    bei maximaler Ausgangsleistung (Radio) 1,26A
    bei maximaler Ausgangsleistung (Cassette) 1,32A
27. Zur Betriebssicherheit
    Die im Schaltplan mit ⚠ gekennzeichneten Bauteile sind für einen sicheren Betrieb dieses Gerätes besonders wichtig und sollten daher nur durch Originalbauteile ersetzt werden.

ABGLEICH

■ VORGANGSWEISE BEIM ABGLEICH

BITTE DIESEN ABSCHNITT VOR DEM ABGLEICH SORGFÄLTIG DURCHLESEN

1. Den Lautstärkeregler in die Maximalposition stellen.
2. Den Regler für graphische Entzerrung stellen.
3. Den Wellenbereichsschalter auf LW, MW, KW oder UKW stellen.
4. Den Balanceregler in die Mittelposition stellen.
5. Den Funktionsschalter auf „radio" stellen.
6. Drehen Sie den Feinabstimmregler in die Mittelstellung.
7. Den Betriebsart auf „stereo".
8. Eine Gleichspannung von 12 V anlegen.
9. Der Signalgeneratorausgang sollte nicht größer sein, als für eine Ausgangsanzeige unbedingt notwendig ist.

■ LW-, MW- und KW-ABGLEICH

	WELLENBAND	SIGNALGENERATOR oder WOBBELGENERATOR ANSCHLÜSSE	SIGNALGENERATOR oder WOBBELGENERATOR FREQUENZ	STELLUNG DES ABSTIMMREGLERS	MESSGERÄT (ELEKTRONIK-VOLTMETER oder OSZILLOSKOP)	ABGLEICH	BEMERKUNGEN
			AM-ZF-ABGLEICH				
(1)	MW	Aus einem Draht einige Schleifen-windungen bilden und das Signal in die Empfängerschleife abstrahlen.	455 kHz, 30% mod (Modulationsfrequenz 400 Hz)	Der Abstimmpunkt, wo keine Interferenz auftritt. (ungefähr bei 600 kHz)	Ausgangsleistungsmesser parallel zur Lautsprecher-Schwingspule.	T2 (AM-ZF-Abgleich)	Die maximale Ausgangsleistung einstellen.
			LW-HF-ABGLEICH				
(2)	LW	〃	136 kHz	Drehkondensator ganz geschlossen.	〃	L8 (LW-Oszillatorspule)	〃
(3)	LW	〃	297 kHz	Drehkondensator ganz aufgedreht.	〃	CT7 (LW-Oszillatortrimmer)	〃
(4)	LW	〃	145 kHz	Das Signal abstimmen.	〃	(*1) L2 (LW-Antennenspule)	Die maximale Ausgangsleistung einstellen. L2 durch Verschieben am Ferritkern abgleichen.
(5)	LW	〃	285 kHz	〃	〃	CT5 (LW-Antennentrimmer)	Die maximale Ausgangsleistung einstellen. Die Schritte (2) bis (5) wiederholen.
			MW-HF-ABGLEICH				
(6)	MW	〃	511 kHz	Drehkondensator ganz geschlossen.	〃	L9 (MW-Oszillatorspule)	Die maximale Ausgangsleistung einstellen.
(7)	MW	〃	1,650 kHz	Drehkondensator ganz aufgedreht.	〃	CT4 (MW-Oszillatortrimmer)	〃
(8)	MW	〃	550 kHz	Das Signal abstimmen.	〃	(*1) L3 (MW-Antennenspule)	Die maximale Ausgangsleistung einstellen. L3 durch Verschieben am Ferritkern abgleichen.
(9)	MW	〃	1,500 kHz	〃	〃	CT1 (MW-Antennentrimmer)	Die maximale Ausgangsleistung einstellen. Die Schritte (6) bis (9) wiederholen.
	(*1) Nach beendetem Abgleich ist der Antennenspulenkörper mit Wachs zu befestigen.						
			KW-HF ABGLEICH				
(10)	KW	Über einen Keramikkondensator (10 pF) an den Meßpunkt ▼ anschließen. Den negativen Ausgang an den Meßpunkt ▽ anschließen.	5,75 MHz	Drehkondensator ganz geschlossen.	〃	L10 (KW-Oszillatorspule)	Die maximale Ausgangsleistung einstellen.
(11)	KW		18,8 MHz	Drehkondensator ganz aufgedreht.	〃	CT8 (KW-Oszillatortrimmer)	〃
(12)	KW		5,9 MHz	Das Signal abstimmen.	〃	L4 (KW-Antennenspule)	Die maximale Ausgangsleistung einstellen. Die Schritte (10) bis (12) wiederholen.

■ UKW

(1) (2) (3) (4) (5) (6)

■ KAN

Eins
Pilo

■ UKW-ABGLEICH

	WELLENBAND	SIGNALGENERATOR oder WOBBELGENERATOR ANSCHLÜSSE	SIGNALGENERATOR oder WOBBELGENERATOR FREQUENZ	STELLUNG DES ABSTIMMREGLERS	MESSGERÄT (ELEKTRONIK-VOLTMETER oder OSZILLOSKOP)	ABGLEICH	BEMERKUNGEN
		UKW-ZF-ABGLEICH					
(1)	UKW	Über einen 0,001 μF-Kondensator an den Meßpunkt ⑰ anschließen. Den negativen Ausgang an den Meßpunkt ⑩ anschließen.	10,7 MHz (SWP.)	Der Abstimmpunkt, wo keine Interferenz auftritt (ungefähr bei 90 MHz).	Die Vertikalamplitude des Oszilloskops an den Meßpunkt ⑨ anschließen. Den negativen Ausgang an den Meßpunkt ⑮ anschließen.	T1 (1. UKW-ZF-Abgleich)	Die Maximalamplitude einstellen. (Siehe Abb. 19.)
(2)	UKW	〃	〃	〃	〃	T3 (2. UKW-ZF-Abgleich)	Die Maximalamplitude einstellen. (Siehe Abb. 20.)
		UKW-HF-ABGLEICH					
(3)	UKW	Über eine künstliche UKW-Antenne an den Meßpunkt ⑦ anschließen. Den negativen Ausgang an den Meßpunkt ⑩ anschließen.	87,5 MHz	Drehkondensator ganz geschlossen.	Ausgangsleistungsmesser parallel zur Lautsprecher-Schwingspule.	L7 (UKW-Oszillatorspule)	(*2) Die maximale Ausgangsleistung einstellen.
(4)	UKW		108 MHz	Drehkondensator ganz aufgedreht.	〃	CT3 (UKW-Oszillatortrimmer)	〃
(5)	UKW		90 MHz	Das Signal abstimmen.	〃	L5 (UKW-Antennenspule)	〃
(6)	UKW		106 MHz	〃	〃	CT2 (UKW-Antennentrimmer)	(*2) Die maximale Ausgangsleistung einstellen. Die Schritte (3) bis (6) wiederholen.

(*2) Es gibt drei verschiedene Ausgangsfrequenzkurven. Stimmen Sie die Mittelfrequenz ab.

■ KANALTRENNUNGSABGLEICH

PRÜFUNG	UKW-MESSENDER SOURCE-ANSCHLUSS	GERÄTEANSCHLUSS (ELEKTRONISCHER ZÄHLER)	EINSTELLUNG	ANGABEN	BEMERKUNGEN
Einstellung des Pilottons	98 MHz, 60 dB Am Prüfpunkt ⑦ über eine Künstliche UKW-Antenne anschließen, die negative Seite mit dem Prüfpunkt ⑩ verbinden.	⑦ . . . (+) ⑮ . . . (−)	VR1	19 kHz	Mit dem elektronischen Zähler den Spannungskonstanthalter (VR1) auf 19 kHz (±100 Hz) einstellen.

■ AUDIO-ABGLEICH

EINSTELLUNG	EINGANG	MESSPUNKT	MESSWERT	EINSTELL-PUNKT	BEMERKUNGEN
Azimut	QZZCAC (10 kHz, −20 dB)	EXT SP	Die maximale Ausgangsleistung einstellen.	Azimut-Einstellschraube	bei Wiedergabe
Wiedergabepegel	QZZCLA (315 Hz, 0 dB)	⑦ . . . (linker Kanal) ⑧ . . . (rechter Kanal) ⑭ . . . (Masse)	420 mV	VR101 (linker Kanal) VR201 (rechter Kanal)	bei Wiedergabe
Oszillationsfrequenz für Vormagnetisierung	———	⑨ . . . (+) ⑮ . . . (−)	66,2±0,5 kHz	L301	bei Aufnahme: Oszillator→I Bandsortenwähler . . . Reineisen
Löschstrom	für Reineisenband	⑨ . . . (+) ⑮ . . . (−)	140±$^{10}_{5}$ mV	VR301	bei Aufnahme: Oszillator→I Bandsortenwähler . . . Reineisen
Vormagnetisierungsstrom	für Reineisenband	⑦ . . . (linker Kanal) ⑧ . . . (rechter Kanal) ⑭ . . . (Masse)	Reineisen 4,0±$^{0,2}_{0,4}$ mV Normal 2,0±0,2 mV	Reineisen VR102 (linker Kanal) VR202 (rechter Kanal) Normal VR304	bei Aufnahme: Oszillator→I Bandsortenwähler . . . Reineisen
Gesamtverstärkung	Außenmikrofon („DIN-Buchse") f=1 kHz, −57 dB Input Pin① . . . (+) linker kanal Pin④ . . . (+) rechter kanal Pin② . . . (−)	DIN-Buchse Output Pin③ . . . (+) linker kanal Pin⑤ . . . (+) rechter kanal Pin② . . . (−)	Output . . . ±0 mV	VR103 (linker Kanal) VR203 (rechter Kanal)	1. An der DIN-Eingangsbuchse ein Signal von −57 dB (1,4 mV) und 1 kHz anlegen. 2. Die Ausgangsspannung des IC5 an den Stiften ⑨ und ⑫ messen. 3. Das Gerät auf Aufnahme schalten und ein Signal aufnehmen. 4. Die Aufnahme abspielen und die Ausgangsspannung des IC5 an den Stiften ⑨ und ⑫ messen. 5. Die in den Punkten 2 und 4 gemessenen Ausgangsspannungen miteinander vergleichen. Einstellen, so daß kein Pegelunterschied vorhanden ist. (Einstellung 0±1 dB) *Referenzwert für Ausgangsspannung des IC5 an den Stiften ⑨ und ⑫ . . . 380 mV

■ ABGLEICH DER LEUCHTDIODEN-ANZEIGE

PRÜFUNG	EINSTELLUNG	BEMERKUNGEN
Pegelprüfung	VR303	1. Testband abspielen (QZZCLA). 2. VR303 so einstellen, daß die sechste Leuchtdiode von links aufleuchtet.

Ref. No.	Part No.	Part Name & Description	Per Set	
IC6	RVILA4505	IC	1	
IC7	AN6884	IC	1	
Q1,2	2SA838-B	Transistor (Ge)	2	S
Q3	2SC1359B	Transistor (Si)	1	
Q101,201,	301,304,306 2SC1684S	Transistor (Si)	5	
Q102,104, 204,401,	202, 501 2SC1684HS	Transistor (Si)	6	
Q103,203	2SC2001K1	Transistor (Si)	2	
Q302,303	2SC1317NCR	Transistor (Si)	2	
Q305	2SA722-S	Transistor (Ge)	1	S
Q307	2SC1847R	Transistor (Si)	1	
Q308	2SC1684R	Transistor (Si)	1	
Q402∿406,	502∿506 2SC1684HR	Transistor (Si)	10	
D1,322,323	MA27WA	Diode (Si)	3	
D2,4,5,101 201∿204, 304,306∿	∿104, 301∿ 309 MA161	Diode (Si)	19	S
D3	AVDSD113	Diode (Si)	1	S
D6	MA1051	Diode (Si)	1	S
D305	MA1100	Diode (Si)	1	S
D318∿321	RVDSM1A02	Diode (Si)	4	
D310∿317	LN081124P	LED	1	
		THERMISTOR		
TH301	RRT202	Thermistor	1	
		COILS AND TRANSFORMERS		
L2,3	RLF6D17	Antenna Coil, LW, MW	1	
L4	QLA3M8	Antenna Coil, SW	1	
L5	RLD4Y44	Antenna Coil, FM	1	
L7	RLD4Y43	Oscillator Coil, FM	1	
L8	RLO1M4	Oscillator Coil, LW	1	
L9	RLO2M14	Oscillator Coil, MW	1	
L10	RLO3M31	Oscillator Coil, SW	1	
L101,201	RLQZM473J	Coil, Bias	2	
L102,202	RLE5029	Filter	2	
L301	RLO9C33	Coil, Bias	1	
L302	RLQZB101K	Choke Coil	1	
T1,3	RLI4M101	IFT, FM 1st, 2nd	2	
T2	RLI2M207	IFT, AM	1	
T301	RLT5L4G2A	Power Transformer	1	⚠
		VARIABLE RESISTORS		
VR1	RVNCA24B3	Variable Resistor, 20kΩ (B)	1	
VR101,201	,304 RVNCC14B1	Variable Resistor, 10kΩ (B)	3	
VR 102,202	RVNCA54B4	Variable Resistor, 50kΩ (B)	2	
VR 103,203	RVNCA15B4	Variable Resistor, 100kΩ (B)	2	
VR 301,303	RVNCA14B4	Variable Resistor, 10kΩ (B)	2	
VR302	EWHN3AF15G54	Variable Resistor, 50kΩ (G)	1	
VR 401,501	EVBU14C10B54	Variable Resistor, 50kΩ (B)	1	
VR402∿406	,502∿506 EWANACC15G54	Variable Resistor, 50kΩ (G)	5	
		VARIABLE CAPACITORS		
VC1∿4	RCV4RC2RA	Tuning Capacitor W/Trimmer Capacitor (CT1∿4)	1	
VC5	RCVAFTBC15	Fine Tuning	1	
CT5,7	RCVTZ20F	Trimmer Capacitor	2	
CT8	RCVTZ11F	Trimmer Capacitor	1	
		CERAMIC FILTERS		
CF1	RVF107MTWAZ	Ceramic Filter	1	
CF2	RVFSFZ455A	Ceramic Filter	1	

Ref. No.	Part No.	Part Name & Description	Per Set	
		COMPONENT COMBINATION		
Z1	RXABPMB6AW	Component Combination	1	
		SPEAKERS		
	EAS10P239S	Speaker, 10cm (4"), 3Ω, Woofer	2	
	EAS3FP03A	Speaker, 3cm (1-1/4"), 1.3kΩ, Tweeter	2	
		SWITCHES		
S1	RSS4H02Z	Switch, Band	1	
S2	RSH2J01T	Switch, Record/Playback	1	
S3	RSS2D01X	Switch, Input	1	
S4,7,8	RSHX051Z	Switch, Tape, Dolby, Mode	1	
S5	RSS3A06Z	Switch, Function	1	
S6	RSS3F08Z	Switch, Beat Proof	1	
S9∿11	RSH1A25Z	Switch, Motor, Play, FF/REW	3	
S12	RSR4A07Y	Switch, Voltage Selector	1	⚠
		JACKS		
J1	RJJ1D7Z	Jack, EXT. Mic (Lch)	1	
J2	QJA0172A	Jack, EXT. Mic (Rch)	1	
J3	RJJ1E9Y	Jack, Headphone	1	
J4	RJJ1F2Z	Jack, AC/DC IN	1	⚠
J5	RJF1046Z	Jack, Line	1	
J6	RJF1087Z	Jack, Phono	1	
J7,8	RJF1088Z	Jack, EXT. SP (L,Rch)	2	
J9	RJS0J2Z	Jack, DIN	1	
		CABINET PARTS		
K1	RYM1XC45LSX7	Front Cabinet Ass'y (Silver)	1	
K1	RYM1XC45LSX1	Front Cabinet Ass'y (Metallic Brown)	1	
K2	RYFXC45LSXG7	Rear Cabinet Ass'y (Silver)	1	
K2	RYFXC45LSXG1	Rear Cabinet Ass'y (Metallic Brown)	1	
K2-1	RJC931Z	Spring, Battery +, - Side	1	
K2-2	RKX277Z5	Handle (Silver)	1	
K2-2	RKX277Z4	Handle (Metallic Brown)	1	
K2-3	RKX255Z	Arm, Handle	2	
K2-4	RNW591Z	Washer, Arm	4	
K2-5	XTC3+8CFN	Screw, Handle M'tg	2	
K3	RYPXC45LSXG5	Cassette Panel Ass'y (Silver)	1	
K3	RYPXC45LSXG4	Cassette Panel Ass'y (Metallic Brown)	1	
K4	RYQXC45LSXG1	Cassette Holder (Silver)	1	
K4	RYQXC45LSXG	Cassette Holder (Metallic Brown)	1	
K5	RKK244Z94	Battery Compartment (Silver)	1	
K5	RKK244Z93	Battery Compartment (Metallic Brown)	1	
K6	XEARR225EAY	Telescopic Antenna	1	
K7	RUS504Z	Spring, Cassette Holder	1	
K8	RME323Z	Gear Holder	1	
K9	QDG1102	Dump Gear	1	
K10	RBS193Z	Knob, Balance	1	
K11	XYN3+F15FY	Screw, Telescopic Antenna M'tg	1	
K12	XTN3+45G	Screw, Cabinet M'tg	5	
K13	XTV3+10G	Screw, Gear Holder M'tg	2	
K14	RYM2XC45LS94	Front Speaker Cabinet Ass'y (Silver)	2	
K14	RYM2XC45LS93	Front Speaker Cabinet Ass'y (Metallic Brown)	2	
K15	RKF641Z94	Cover, Speaker Cabinet (Left) (Silver)	1	

Ref. No.	Part No.	Part Name & Description	Per Set
K15	RKF641Z93	Cover, Speaker Cabinet (Left) (Metallic Brown)	1
K16	RKF641Y94	Cover, Speaker Cabinet (Right) (Silver)	1
K16	RKF641Y93	Cover, Speaker Cabinet (Right) (Metallic Brown)	1
K17	RUA539Z	Slider Chassis (L,R)	2
K18	RJT815Z	Terminal Speaker (L,R)	4
K19	RDS2072Z	Spring, Slider (L,R)	2
K20	RHM159Z	Steel Ball, Slider (L,R)	2
K21	RGE72Z	Slider (L,R)	2
K22	RJF1090Z	Terminal (L,R)	2
K23	RUL688Z	Bracket (L,R)	2
K24	XTN3+20C	Screw, Speaker Cover M'tg	8
K25	XTV3+12G	Screw, Slider Chassis M'tg (L,R)	6
K26	XTV3+8G	Screw, Woofer M'tg (L,R)	8
K27	XTV3+10G	Screw, Tweeter M'tg (L,R)	4
		ELECTRICAL PARTS	
E1	RYT1XC45M	Tuning Knob Ass'y	1
E2	RBD202Z	Knob, Band, Function	2
E3	RBD201Z	Knob, Volume	1
E4	RBD200Z	Knob, Graphic Equalizer	5
E5	RBN657Z	Knob, Fine Tuning	1
E6	XNS8D	Nut, Fine Tuning	1
E7	RBC470Z	Button, Tape, Mode, Dolby NR	3
E8	RJS2L1Z	Socket, 2 Pin	2
E9	RJT462Z	Terminal, Socket	4
E10	RJS3L3Z	Socket, 3 Pin	1
E11	RJS4L3Z	Socket, 4 Pin	1
E12	RJS6L3Z	Socket, 6 Pin	1
E13	RJS9L3Z	Socket, 9 Pin	1
E14	RJT707Z	Terminal, Socket	27
E15	RJP2G2Z	Plug, 2 Pin	2
E16	RJP3G4Y	Plug, 3 Pin	1
E17	RJP4G4Y	Plug, 4 Pin	1
E18	RJP6G4Y	Plug, 6 Pin	1
E19	RJP9G4Y	Plug, 9 Pin	1
E20	RDE132Z	Gear, Dial	1
E21	RDP243Z	Pointer, Dial	1
E22	RUA533Z	Dial Chassis	1
E23	QTF1054	Terminal, Fuse	4 ⚠
E24	WM034CZ192	Microphone	1
E25	RME322Z	Holder, Microphone	1
E26	RJF1088Z	Terminal, EXT SP	2
E27	RJT816Z	Terminal, SP	4
E28	RJC511Z	Spring, Battery - Side	1
E29	RJT202B	Terminal Earth	1
E30	XBA2C20TR0	Fuse, T2A	1 ⚠
E31	XBA2C016SS0	Fuse, T160mA	1 ⚠
E32	RDG5712Z	Gear, Dial	1
E33	RUB279Z	Lever, Record	1
E34	XTV3+12G	Screw, Circuit Board M'tg	11
E35	XSN26+6	Screw, Gear M'tg	1 S
E36	XWA26B	Washer	1 S
E37	XTV3+8BFN	Screw, Heat Sink M'tg	3 S
E38	XTV3+10G	Screw, Chassis M'tg	2
E39	XTWS3+10Q	Screw, Record Lever	1
E40	XTV26+6F	Screw, Circuit Board M'tg	3
E41	XTW3+12Q	Screw, Tuning Knob M'tg	1
E42	RJS5L3Z	Socket, 5 Pin	1
E43	RJP5G4Y	Plug, 5 Pin	1
		ACCESSORIES	
	RJA20Z	Power Cord, AC	1 ⚠
	RJE123Y	Cord, Speaker (1.5m)	2

Ref. No.	Part No.	Part Name & Description	Per Set
		PACKING MATERIALS	
	XZB50X40A04	Polyethylene Cover	1 S
	RPN3971Z	Pad, Bottom	1
	RPN3972Z	Pad, Side	1
	RPN3976Z	Pad, Side	1
	XZB36X35A04	Polyethylene Cover	2 S
	XZB10X25A04	Polyethylene Cover	1
	RPK1580Z	Gift Box	1
	RPH418Z	Soft Sheet	1
		PRINTED MATERIAL	
	RQX4166Z	Instruction Book	1

Ref. No.	Part No.	Value	
	RESISTORS		
R2	ERD25FJ220	22	S
R4	ERD25FJ470	47	S
R7	ERD25TJ474	470k	S
R10	ERD25TJ334	330k	S
R15	ERD25FJ471	470	S
R16	ERD25FJ101	100	S
R20	ERD25FJ563	56k	S
R22	ERD25FJ221	220	S
R23	ERD25FJ180	18	S
R25	ERD25FJ472	4.7k	S
R26	ERD25FJ153	15k	S
R27	ERD25FJ152	1.5k	S
R101	ERD25TJ683	68k	S
R102	ERD25FJ392	3.9k	S
R103	ERD25FJ100	10	S
R104	ERD25FJ103	10k	S
R105	ERD25TJ823	82k	S
R106	ERD25TJ104	100k	S
R107	ERD25FJ471	470	S
R109	ERD25FJ152	1.5k	S
R111	ERD25TJ104	100k	S
R114	ERD25FJ392	3.9k	S
R115	ERD25FJ472	4.7k	S
R116	ERD25FJ153	15k	S
R117	ERD25FJ152	1.5k	S
R118	ERD25TJ474	470k	S
R121	ERD25FJ122	1.2k	S
R122	ERD25TJ683	68k	S
R123	ERD25TJ274	270k	S
R124	ERD25FJ332	3.3k	S
R125	ERD25FJ473	47k	S
R126	ERD25FJ472	4.7k	S
R132	ERD25FJ332	3.3k	S
R134	ERD25FJ333	33k	S
R135	ERD25TJ684	680k	S
R138	ERD25FJ680	68	S
R139	ERD25FJ222	2.2k	S
R140	ERD25FJ272	2.7k	S
R141	ERD25FJ121	120	S
R142	ERD25FJ2R2	2.2	S
R143	ERD25FJ221	220	S
R144	ERD25FJ152	1.5k	S
R146	ERD25FJ332	3.3k	S
R201	ERD25TJ683	68k	S
R202	ERD25FJ392	3.9k	S
R203	ERD25FJ100	10	S
R204	ERD25FJ103	10k	S
R205	ERD25TJ823	82k	S
R206	ERD25TJ104	100k	S
R207	ERD25FJ471	470	S
R209	ERD25FJ152	1.5k	S
R211	ERD25TJ104	100k	S
R214	ERD25FJ392	3.9k	S
R215	ERD25FJ472	4.7k	S
R216	ERD25FJ153	15k	S
R217	ERD25FJ152	1.5k	S
R218	ERD25TJ474	470k	S
R221	ERD25FJ122	1.2k	S
R222	ERD25TJ683	68k	S

Ref. No.	Part No.	Value	
R223	ERD25TJ274	270k	S
R224	ERD25FJ332	3.3k	S
R225	ERD25FJ473	47k	S
R226	ERD25FJ472	4.7k	S
R232	ERD25FJ332	3.3k	S
R234	ERD25FJ333	33k	S
R235	ERD25TJ684	680k	S
R238	ERD25FJ680	68	S
R239	ERD25FJ222	2.2k	S
R240	ERD25FJ272	2.7k	S
R242	ERD25FJ2R2	2.2	S
R243	ERD25FJ221	220	S
R244	ERD25FJ152	1.5k	S
R246	ERD25FJ332	3.3k	S
R305	ERD25FJ1R0	1	S
R306	ERD25FJ101	100	S
R307	ERD25FJ6R8	6.8	S
R308	ERD25FJ222	2.2k	S
R310	ERD25FJ1R5	1.5	S
R313	ERD25FJ332	3.3k	S
R315	ERC12GJ106	10M	S
R327	ERD25FJ470	47	S
R328	ERD25FJ561	560	S
R330	ERD50FJ101	100	S
R331	ERD25FJ101	100	S
R332	ERD50FJ681	680	S
R333	ERD25FJ221	220	S
R340	ERX1ANJR47	0.47	S
R342	ERD25FJ221	220	S
R343	ERG2ANJ101	100	S
R344	ERD25FJ222	2.2k	S
R345	ERD25FJ222	2.2k	S
R403	ERD25TJ474	470k	S
R503	ERD25TJ474	470k	S
	CAPACITORS		
C1	ECCD1H150KC	15P	
C2	ECCD1H100KC	10P	
C3	ECCD1H470KC	47P	
C4	ECCD1H120KC	12P	
C5	ECCD1H150KC	15P	
C6	ECCD1H040C	4P	
C7	ECCD1H331K	330P	
C8	ECCD1H050C	5P	
C9	ECCD1H220KC	22P	
C10	ECKD1H102KB	0.001	
C11	ECCD1H150KC	15P	
C12	ECCD1H070DC	7P	
C13	ECFT1E683MD	0.068	
C14	ECFT1E223MD	0.022	
C15	ECQP2A221JZ	220P	
C16	ECQP1151JZ	150P	
C17	ECCD1H100KC	10P	
C18	ECQP2A361JZ	360P	
C19	ECCD1H040C	4P	
C20	ECQP2A392JZ	0.0039	
C21	ECKD1H103ZF	0.01	
C22	ECKD1H103ZF	0.01	
C23	ECFT1E473MD	0.047	

Ref. No.	Part No.	Value	
C24	ECEA1CS330	33	S
C25	ECCD1H820KC	82P	
C26	ECFT1E223MD	0.022	
C27	ECFT1E223MD	0.022	
C28	ECCD1H470KC	47P	
C29	ECCD1H100KC	10P	
C30	ECKD1H103ZF	0.01	
C31	ECFT1E223MD	0.022	
C32	ECEA1AS101	100	S
C33	ECFT1E223MD	0.022	
C34	ECFT1E223MD	0.022	
C35	ECKD1H222MD	0.0022	
C36	ECKD1H102KB	0.001	
C37	ECFT1E333MD	0.033	
C38	ECEA25Z4R7	4.7	
C39	ECFT1E473MD	0.047	
C40	ECEA1AS470	47	S
C41	ECEA50Z1	1	S
C42	ECEA50ZR22	0.22	S
C43	ECQP2A471JZ	470P	
C44	ECCD1H220KC	22P	
C45	ECFT1E473MD	0.047	
C46	ECCD1H070DC	7P	
C47	ECKD1H103MD	0.01	
C48	ECKD1H103ZF	0.01	
C49	ECKD1H102MD	0.001	
C50	ECKD1H102MD	0.001	
C51	ECCD1H020C	2P	
C52	ECCD1H101K	100P	
C101	ECEA50Z1	1	S
C102	ECFT1E103MD	0.01	
C103	ECFT1E333MD	0.033	
C104	ECEA50Z3R3	3.3	S
C105	ECEA1AS470	47	S
C106	ECCD1H101K	100P	
C107	ECEA50Z2R2	2.2	S
C108	ECCD1H101K	100P	
C109	ECEA50Z3R3	3.3	S
C110	ECKD1H471KB	470P	
C111	ECFT1E333KD	0.033	
C112	ECFT1E152KD	0.0015	
C113	ECCD1H331K	330P	
C114	ECEA50ZR47	0.47	S
C115	ECCD1H101K	100P	
C116	ECEA1AU471	470	
C117	ECEA1HS100	10	
C118	ECEA50ZR1	0.1	S
C119	ECEA50ZR33	0.33	S
C120	ECFT1E473KD	0.047	
C121	ECEA1HS100	10	S
C122	ECFT1E472KD	0.0047	
C123	ECEA50Z3R3	3.3	S
C124	ECCD1H101K	100P	
C125	ECEA25Z4R7	4.7	S
C126	ECEA25Z4R7	4.7	S
C127	ECFT1E473MD	0.047	
C128	ECFT1E473MD	0.047	
C129	ECEA50Z1	1	S
C130	ECEA50ZR33	0.33	S
C131	ECEA1HS100	10	S
C132	ECFT1E153MD	0.015	
C133	ECFT1E473MD	0.047	
C134	ECKD1H332MD	0.0033	
C135	ECEA50Z1	1	S
C136	ECEA1AS101	100	S
C137	ECKD1H102MD	0.001	
C138	ECEA1AS101	100	S
C139	ECCD1H101K	100P	
C140	ECCD1H070DC	7P	
C141	ECCD1H220KC	22P	
C142	ECFT1E103MD	0.001	
C143	ECEA1AU101	100	
C144	ECQV05224JZ	0.22	
C145	ECEA1AU102	1000	
C146	ECEA25Z4R7	4.7	S
C147	ECFT1E333MD	0.033	

Ref. No.	Part No.	Value	
C148	ECEA1AS470	47	S
C149	ECFT1E333KD	0.033	
C150	ECCD1H101K	100P	
C151	ECCD1H101K	100P	
C152	ECCD1H101K	100P	
C153	ECFT1E473MD	0.047	
C201	ECEA50Z1	1	S
C202	ECFT1E103MD	0.01	
C203	ECFT1E333MD	0.033	
C204	ECEA50Z3R3	3.3	S
C205	ECEA1AS470	47	S
C206	ECCD1H101K	100P	
C207	ECEA50Z2R2	2.2	S
C208	ECCD1H101K	100P	
C209	ECEA50Z3R3	3.3	S
C210	ECKD1H471KB	470P	
C211	ECFT1E333KD	0.033	
C212	ECFT1E152KD	0.0015	
C213	ECCD1H331K	330P	
C214	ECEA50ZR47	0.47	S
C215	ECCD1H101K	100P	
C216	ECEA1AF101	100	
C217	ECEA1HS100	10	S
C218	ECEA50ZR1	0.1	S
C219	ECEA50ZR33	0.33	S
C220	ECFT1E473KD	0.047	
C221	ECEA1HS100	10	S
C222	ECFT1E472KD	0.0047	
C223	ECEA50Z3R3	3.3	S
C224	ECCD1H101K	100P	
C225	ECEA25Z4R7	4.7	S
C226	ECEA25Z4R7	4.7	S
C227	ECFT1E473MD	0.047	
C228	ECFT1E473MD	0.047	
C229	ECEA50Z1	1	S
C230	ECEA50ZR33	0.33	S
C231	ECEA1HS100	10	S
C232	ECFT1E153MD	0.015	
C233	ECFT1E473MD	0.047	
C234	ECKD1H332MD	0.0033	
C235	ECEA50Z1	1	S
C236	ECEA1EU101	100	
C237	ECKD1H102MD	0.001	
C238	ECEA1AS101	100	S
C239	ECCD1H101K	100P	
C240	ECCD1H070DC	7P	
C241	ECCD1H220KC	22P	
C242	ECFT1E103MD	0.01	
C243	ECEA1AU101	100	
C244	ECQV05224JZ	0.22	
C245	ECEA1AU102	1000	
C246	ECEA25Z4R7	4.7	S
C247	ECFT1E223MD	0.022	
C248	ECEA1AS470	47	S
C249	ECFT1E333KD	0.033	
C250	ECCD1H101K	100P	
C251	ECCD1H101K	100P	
C252	ECCD1H101K	100P	
C253	ECFT1E473MD	0.047	
C301	ECEA50ZR22	0.22	S
C302	ECEA50ZR1	0.1	S
C303	ECEA1AS470	47P	S
C304	ECEA1AU101	100	
C305	ECEA1AU101	100	
C306	ECQV05273JZ	0.027	
C307	ECQP2A123JZ	0.012	
C308	ECQV05393JZ	0.039	
C309	ECEA1AU221	220	
C310	ECQV05683JZ	0.068	
C311	ECEA1AU221	220	
C312	ECKD1H682MD	0.0068	
C313	ECKD1H332MD	0.0033	
C314	ECKD1H332MD	0.0033	
C315	ECEA1HS100	10	S
C317	ECEA1HS100	10	S

Ref. No.	Part No.	Value	
C318	ECEA0JK101	100	
C320	ECFT1E473MD	0.047	
C321	ECEA1AU471	470	
C322	ECEA1ESS332	3300	
C323	ECEA1AU102	1200	
C324	ECEA1HS100	10	S
C328	ECEA1HS100	10	S
C329	ECEA1EF101	100	
C330	ECKD1H333ZF	0.033	
C331	ECKD1H333ZF	0.033	
C332	ECKD1H333ZF	0.033	
C333	ECKD1H333ZF	0.033	
C334	ECQE1104KN	0.1	
C335	ECEA50Z1	1	S
C336	ECKD1H102ZF	0.001	
C337	ECKD1H102ZF	0.001	
C338	ECEA1AU101	100	
C339	ECEA1AS101	100	S
C340	ECEA50ZR33	0.33	S
C341	ECFT1E103MD	0.01	
C342	ECKD1H102MD	0.001	
C343	ECCD1H331K	330P	
C344	ECEA1ES470	47	S
C345	ECFT1E473MD	0.047	
C347	ECFT1E223MD	0.022	
C401	ECKD1H102MD	0.001	
C402	ECEA50ZR1	0.1	S
C403	ECEA50Z1	1	S
C404	ECCD1H101K	100P	
C405	ECEA50Z1	1	S
C406	ECEA1HS100	10	S
C407	ECFT1E473MD	0.047	
C408	ECEA50Z1	1	S
C409	ECFT1E153MD	0.015	
C410	ECEA50ZR47	0.47	S
C411	ECFT1E472KD	0.0047	
C412	ECEA50ZR22	0.22	S
C413	ECKD1H152MD	0.0015	
C414	ECFT1E473MD	0.047	
C415	ECKD1H471KB	470P	
C416	ECFT1E153MD	0.015	
C501	ECKD1H102MD	0.001	
C502	ECEA50ZR1	0.1	S
C503	ECEA50Z1	1	S
C504	ECCD1H101K	100P	
C505	ECEA50Z1	1	S
C506	ECEA1HS100	10	S
C507	ECFT1E473MD	0.047	
C508	ECEA50Z1	1	S
C509	ECFT1E153MD	0.015	
C510	ECEA50ZR47	0.47	S
C511	ECFT1E472KD	0.0047	
C512	ECEA50ZR22	0.22	S
C513	ECKD1H152MD	0.0015	
C514	ECFT1E473MD	0.047	
C515	ECKD1H471KB	470P	
C516	ECFT1E153MD	0.015	

Ref. No.	Part No.	Value

RD Ⓕ XG
Printed in Japan

ORDER NO. GAD84122107S2

Service Manual

Supplement - 1

Radio Cassette

RX-C45LS
RX-C45LE

(For United Kingdom)

Portable Component System
with 4-Band Radio

- Please use this manual together with the service manual for model No. RX-C45LS order No. GAD83052107C2.
- This service manual indicates the main differences between; Original RX-C45LS and RX-C45LS/RX-C45LE supplement-1 order No. GAD84122107S2.

This is the Service Manual for the following areas.

[Z]...For all European areas except United Kingdom.

[G]...For F.R. Germany.

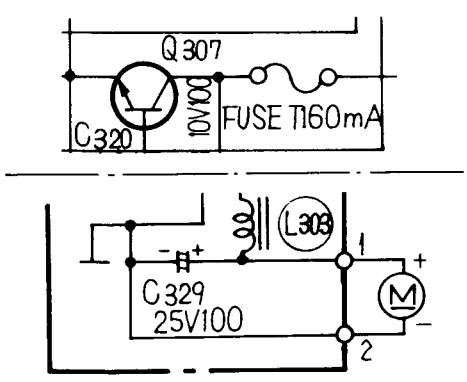
[E]...For United Kingdom.

■ PARTS COMPARISON TABLE

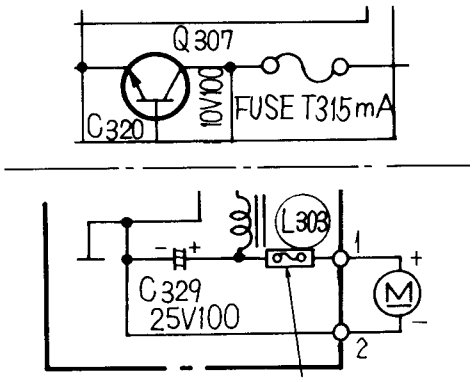
NOTES: Important safety notice.
Components identified by ⚠ mark have special characteristics important for safety.
When replacing any of these components, use only manufacturer's specified parts.

Ref. No.	Description	Part Number		Pcs/ Set	Remarks
		RX-C45LS/RX-C45LE (Original)	RX-C45LS/RX-C45LE (Supplement-1)		
E31	Fuse, T315 mA	XBA2C016SS0	XBA2C03SS0	1	⚠
E44	IC Protector	——	RAHF10WHF	1	Added

■ SCHEMATIC DIAGRAM

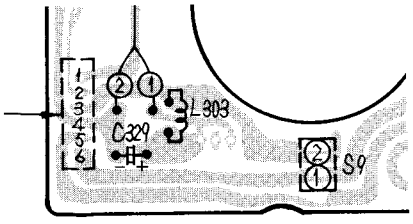


(ORIGINAL)



(NEW) E44 IC Protector

■ CIRCUIT BOARD AND WIRING CONNECTION DIAGRAM



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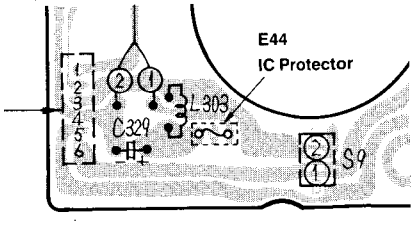

(NEW)

Panasonic

Matsushita Electric Trading Co., Ltd.
P.O. Box 288, Central Osaka Japan

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